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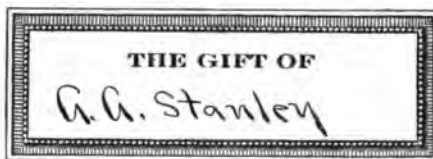
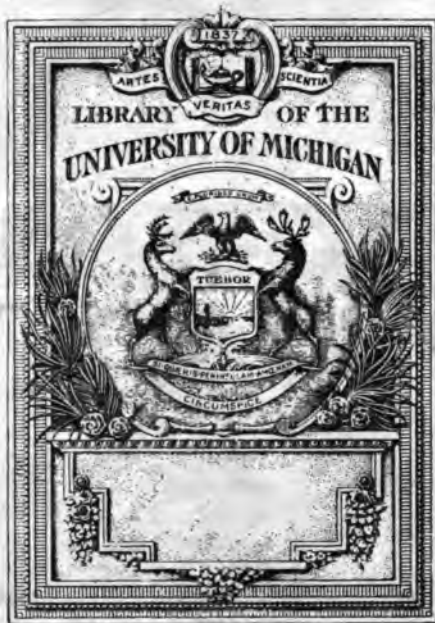
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*Everything
Known
in
Music*





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*The New Home
of Lyon & Healy*

Everything Known in Music

A
SOUVENIR
OF THE NEW HOME OF THE
WORLD'S FOREMOST
MUSIC HOUSE

WITH A BRIEF COMMENT ON
THE INSTRUMENTS
OF THE ORCHESTRA

Lyon & Healy

WABASH AVENUE AT JACKSON BOULEVARD
CHICAGO

Albert A. Stanley

T.
8-25-1922

Trans T.

Mus-X

8564

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by

LYON & HEALY

Chicago

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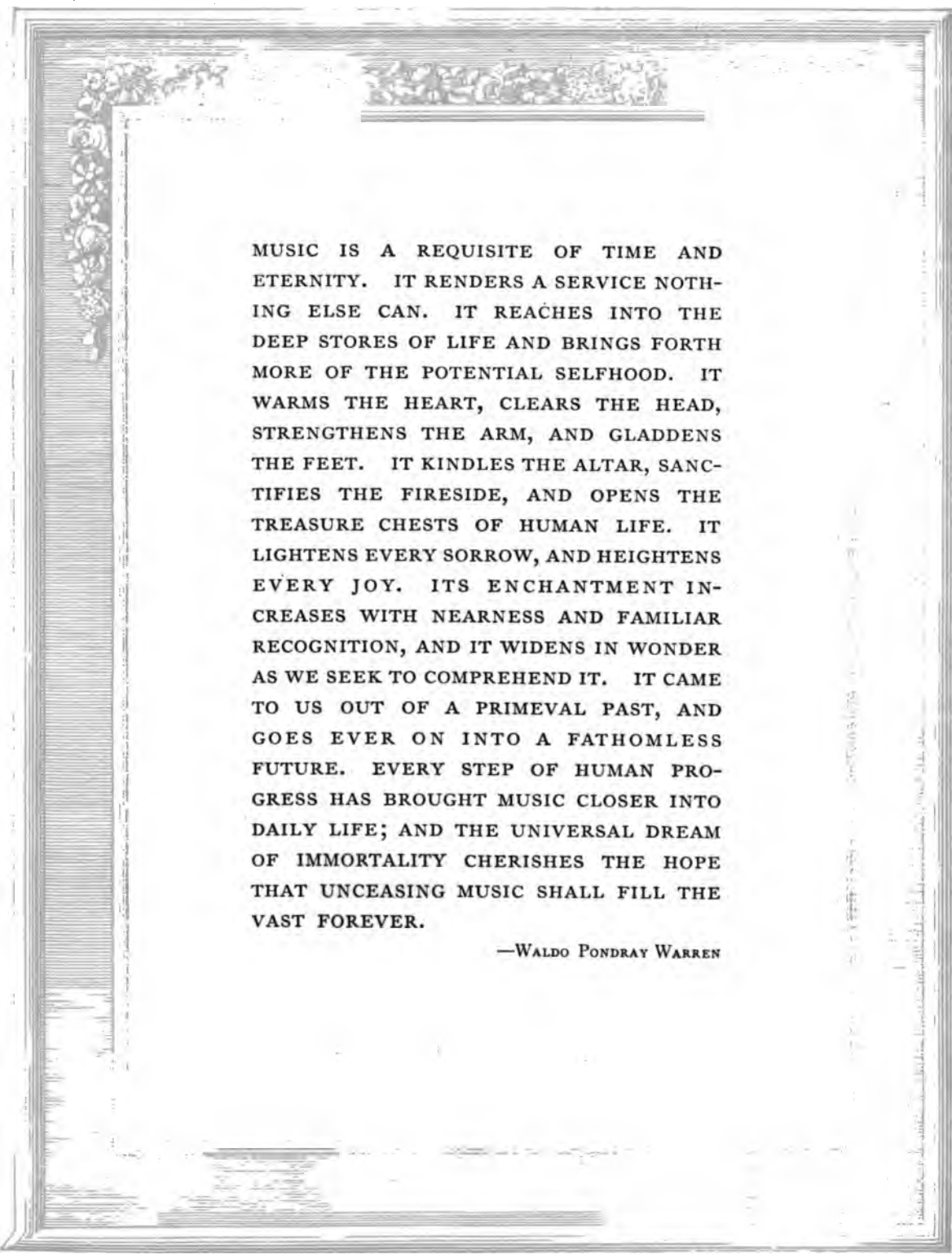
THE FAITHORN COMPANY

Chicago

To
Patrick Joseph Healy

*Born, March 17, 1840
Died, April 3, 1905*

*whose foresight, sympathy
and courage made the
example of his life an
enduring legacy to the
cause of music.*



MUSIC IS A REQUISITE OF TIME AND ETERNITY. IT RENDERS A SERVICE NOTHING ELSE CAN. IT REACHES INTO THE DEEP STORES OF LIFE AND BRINGS FORTH MORE OF THE POTENTIAL SELFHOOD. IT WARMS THE HEART, CLEARS THE HEAD, STRENGTHENS THE ARM, AND GLADDENS THE FEET. IT KINDLES THE ALTAR, SANCTIFIES THE FIRESIDE, AND OPENS THE TREASURE CHESTS OF HUMAN LIFE. IT LIGHTENS EVERY SORROW, AND HEIGHTENS EVERY JOY. ITS ENCHANTMENT INCREASES WITH NEARNESS AND FAMILIAR RECOGNITION, AND IT WIDENS IN WONDER AS WE SEEK TO COMPREHEND IT. IT CAME TO US OUT OF A PRIMEVAL PAST, AND GOES EVER ON INTO A FATHOMLESS FUTURE. EVERY STEP OF HUMAN PROGRESS HAS BROUGHT MUSIC CLOSER INTO DAILY LIFE; AND THE UNIVERSAL DREAM OF IMMORTALITY CHERISHES THE HOPE THAT UNCEASING MUSIC SHALL FILL THE VAST FOREVER.

—WALDO PONDRAY WARREN



IN WELCOMING to our new home the music lovers of Chicago and of the world, it seems especially appropriate that our greetings should bear the title, "Everything Known in Music." A wealth of meaning and sentiment has become associated with this phrase through the fifty years of its use as the slogan of Lyon & Healy. It established the ideal of the firm in its early days, dominated the policies of its development, and stands today as the best characterization of its achievements. An unfeigned pleasure and a justifiable pride accompany the consciousness that nowhere else in the world could this phrase be so truthfully employed.

*Our
Comprehensive
Policy*

The new Lyon & Healy Building, completed and occupied in May, 1916, was erected under the supervision of Mr. Marquette A. Healy and is an expression in steel and stone of the best ideas for the display and sale of musical merchandise which have been evolved through the cumulative experience of half a century.

One street south of the old home, which served the growing needs of Lyon & Healy from the days of the World's Columbian Exposition, the new building stands, with its hospitable doors open to old friends and new.

The building, which is a nine-story steel structure, faced with pink granite and gray terra cotta, follows the Italian Renaissance in the design



EVERYTHING KNOWN
IN MUSIC

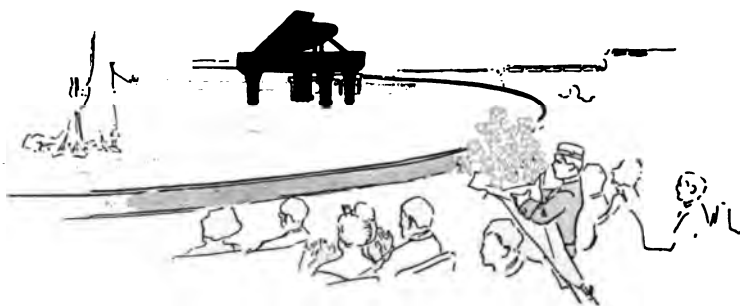
*The General
Arrangement*

of its principal facades, with the introduction of the Corinthian order at the upper stories. The entrances on Jackson Boulevard and Wabash Avenue are finished in walnut, white marble, gold leaf, and white enamel. The corridors are finished with light Toanazzo marble wainscot, the floors are of marble tile, and the woodwork is of walnut.

The first floor is devoted to Victrolas, Sheet Music, Books, and the Lyon & Healy Concert Hall. The second floor is devoted to Victor Records, retail and wholesale, and the third to the display and sale of Pianos. The remaining floors, excepting a few studios on the outer space of the four upper stories, are occupied by various other retail and wholesale lines of musical merchandise, repair workrooms, and the administrative and general offices of the Company.

From the earliest days of the business, which began in October, 1864, the house of Lyon & Healy has stood squarely for the higher ideals of the music business. It has resolutely avoided any policy it would be unwilling to have publicly known, and has given a whole-hearted emphasis to such policies as tend toward perfection and idealism in musical merchandise, sales methods, service and mercantile customs. It has done much to foster an appreciation of the best in music. Its initiative and example have been among the most potent influences for the development of music and the musical instrument industry in America.

Few establishments in the domain of musical merchandise have ever attained a position in their community comparable to that long enjoyed by Lyon & Healy in Chicago. Being one of the oldest commercial institutions in the city, with its prestige well established "before the Fire," it has been conspicuously identified with Chicago's progress, and has had no small part in forming the esthetic ideals of the city, and in furthering their advancement. It has consistently set before the public the best productions of the genius, ingenuity, and skill of the whole world of music. Its steady growth, which has necessitated this new building, is the natural result of the appreciation of its efforts by the public.



EVERYTHING KNOWN
IN MUSIC

The business of Lyon & Healy includes buying, importing, manufacturing, wholesaling, and retailing musical instruments, sheet music, music books, and musical merchandise of all kinds produced anywhere. Our vast stocks embrace, literally, "Everything Known in Music."

Its Scope

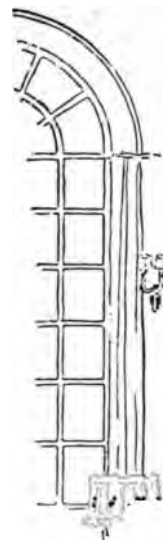
As the world's foremost music house it is distinguished by the magnitude of its business, the extent of its territory, the scope of its stocks, the character of its merchandise, the high quality of its own products, and the conspicuous and honored place it has long occupied in the musical instrument industry.

Our importing activities are extensive and world-wide. To live up to the ideal of selling "Everything Known in Music," it has been necessary to keep in touch with the best producers of musical instruments in every part of the world, and to make their products available for purchase here in Chicago.

Importing

In addition to our established trade connections with the leading producers in America and Europe, our traveling buyers cover the various Old World districts where musical goods are made; and our resident buyer, with permanent offices and warehouses, is located at Markneukirchen, Saxony, the recognized center of the foreign musical instrument industry. The leading foreign musical publications, periodicals, and compositions, are, by the same far-reaching policy, made available at retail in Chicago.

The Manufacturing activities of Lyon & Healy are carried on in an immense new fireproof factory building, located on Fullerton Avenue, Chicago, about six miles from the downtown center of the city. Here are made the world-famous Lyon & Healy Harp, in their various styles; the Lyon & Healy Piano in uprights, grands, and player-pianos; Washburn Pianos; specially designed pianos for export; a large variety of band, orchestral, and other instruments; and minor lines of musical merchandise. In each of these lines our output is very extensive. The ideals which characterize the house of Lyon & Healy are notably dominant in the Manufacturing Department.





*The Main Floor
Salesroom*

**EVERYTHING KNOWN
IN MUSIC**

Our Wholesale business, which occupies the new building jointly *Wholesale* with the retail department, keeps us in constant touch with manufacturers and dealers in musical merchandise everywhere. There are few manufacturers from whom we do not buy, and few dealers to whom we do not sell. Our traveling salesmen visit periodically the leading cities and towns of the United States, and our large illustrated catalogue, for dealers only, places our complete line within reach of any musical goods dealer throughout the United States. Catalogues published in Spanish cover the Latin countries of Central and South America. Orders come to us from almost every country on the globe. The volume and reach of our wholesale business is unequalled in the music trade.

Our Retail business includes everything we import, manufacture, *Retail* or buy, and covers, literally, "Everything Known in Music." In every division of our retail business our stocks are very extensive, and our volume of sales very large.

The Piano department, which early became one of the important branches of the business of Lyon & Healy, includes the exclusive selling agency in the Chicago territory for the Steinway Piano. Several large display rooms on the third floor are devoted to the Steinway Piano exclusively. This superlative instrument, which has been sold in Chicago by Lyon & Healy for nearly fifty years, has exerted a potent influence on our conception of quality in musical instruments.

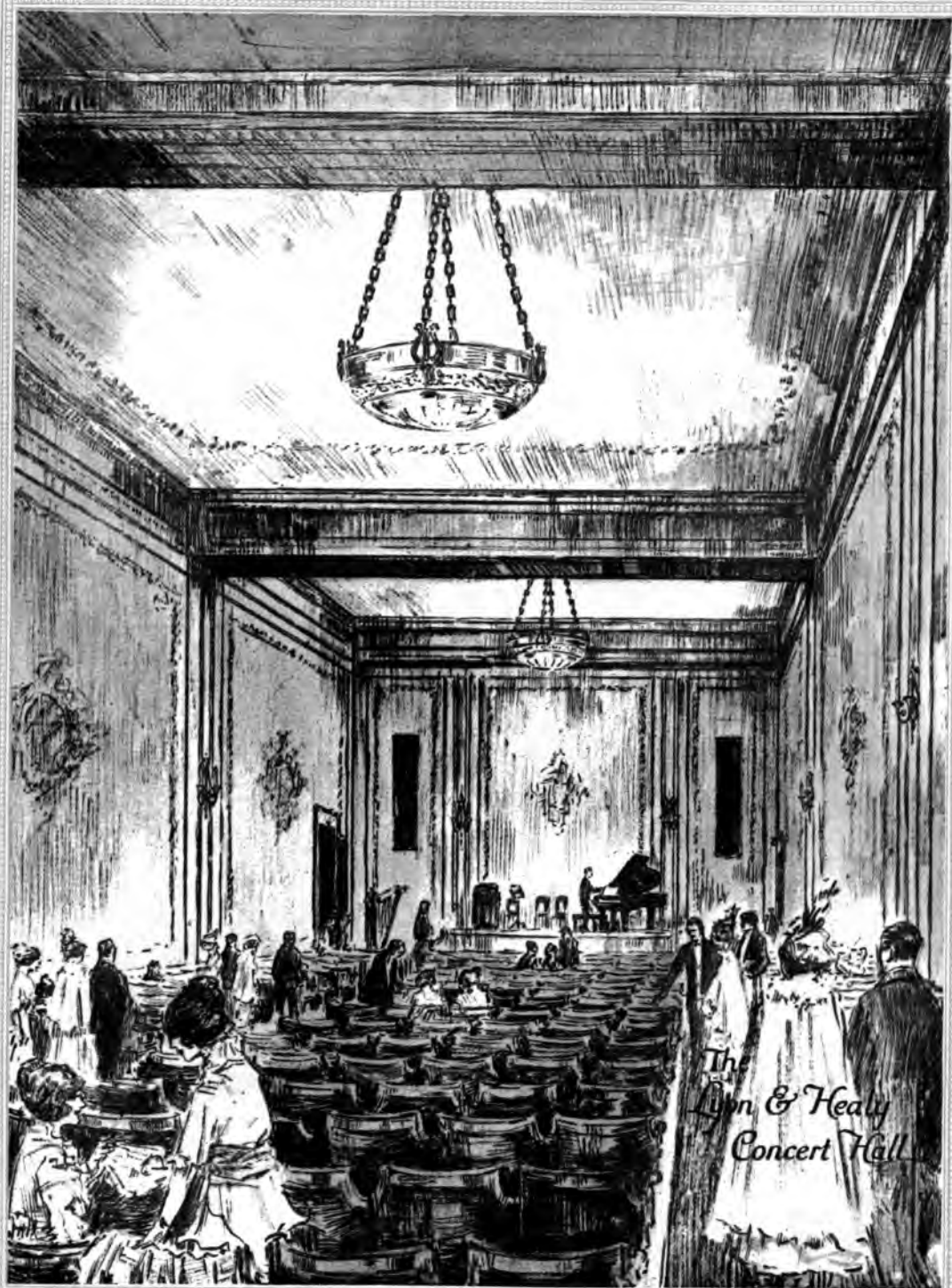
The Aeolian line of Pianola-Pianos, in various styles; the Weber Pianos, and the Steck Pianos, are also sold in Chicago exclusively by us.

The Lyon & Healy Piano, and the Washburn Piano, both being products of our own factory, form an important part of our piano business.

About fifteen or twenty other makes of Pianos are also included in this department.

Another important branch of our retail business is the sale of Victrolas and Victor Records. Our stock of Victor Records is by far the most comprehensive available anywhere. The volume of business we do in this department is enormous, and has assumed a position of vast





The
Lyn & Healy
Concert Hall

**EVERYTHING KNOWN
IN MUSIC**

importance in our business. Victrolas and Victor Records are also handled by us at wholesale, and have been since the inception of this instrument.

In the field of small musical instruments, such as violins, flutes, guitars, mandolins and the like, our stock covers thousands of items, in every possible variation.

In band instruments our stock includes the products of our own factory, and also those of other important American manufacturers, whose entire output is marketed by us, and our extensive importations from the largest factories of Europe.

The Lyon & Healy Harp, in a range of styles and prices, forms another important department of our retail business, and occupies a special salesroom on the fifth floor.

Our stock of sheet music and music books is easily the largest and most complete in the world. This stock is so classified that almost any song or composition one can mention, within a range of more than a quarter of a million titles, can be produced at a moment's notice.

Our extensive experience in selling all kinds and grades of musical instruments, from the finest made to the least expensive, has demonstrated to us in a thousand ways that the increased satisfaction which accompanies the possession of a superior instrument is of far greater importance than the difference in price. For this reason, and not because of any mere commercial motive, we generally advise our customers to purchase as good an instrument as they can afford. We feel that our great and varied stocks, with so many possible alternatives, can best serve their purpose when accompanied by an intelligent selling service such as will insure the ultimate satisfaction of our customers.

The supreme contribution of Lyon & Healy to the cause of music is the Lyon & Healy Harp. This instrument, which was first brought out in 1889, is generally acknowledged throughout the musical world as the most perfect harp made, and distinctly superior to all other makes.

After twenty-five years of experience in selling and repairing harps of the best makes then extant, the conviction was forced upon us that





*Victor Record Salesrooms
Second Floor*

EVERYTHING KNOWN
IN MUSIC

the Harp, although the oldest known instrument of music, had by no means reached its final form of development. It was then determined that Lyon & Healy should make the perfecting of the Harp their contribution to the advancement of music. The great expenditures necessary in experimentation, and the search for the final principle of ideal harp construction, have necessitated substantial subsidies. But the success of the instrument in musical value and in the unqualified approval of the highest authorities in the whole world of music, have amply rewarded our efforts. The court orchestras of the various European capitals, and other celebrated orchestras in Europe and America, have now for many years used the Lyon & Healy Harp. The possession of a Lyon & Healy Harp is either the proud achievement or the fond dream of harpists everywhere.

It now seems reasonably certain that the Harp, for generations after the patents of Lyon & Healy expire, must necessarily follow the principle discovered by our inventors. If this proves true the Lyon & Healy Harp will take its place as a distinct and permanent achievement in the history of music.

For more than a generation it has been the policy of Lyon & Healy to buy rare old violins whenever obtainable, and to hold them, perhaps for years, awaiting a purchaser whose musical appreciation of the rare tone qualities of these old violins was accompanied by the ability and willingness to pay the price which sentiment places upon the masterpieces of an earlier century. In this way it has come about that the Lyon & Healy Collection of Old Violins is unique in its extent, and one of the world-shrines of violin connoisseurs. The collection has, at one time or another, included specimens of the work of every great violin maker of the past. Although many of these genuine old violins may be purchased at prices ranging from \$50 to \$250, some of the rarer ones run high into the thousands. Here are a few typical sales of the better class:

The "Earl Stradivarius," of 1722, sold at \$12,000.

The "Fritz Kreisler Stradivarius," of 1726, at \$14,000.

Old Violins





Piano Reception Room

Third Floor

EVERYTHING KNOWN
IN MUSIC

The "Healy Stradivarius," of 1711, at \$10,000.

The "Bott Stradivarius," of 1722, at \$10,000.

The "Jansa Stradivarius," of 1721, at \$10,000.

An "Antonius Stradivarius," of 1716, at \$10,000.

Another of 1714, at \$8,000; and a large number at from \$6,500 to \$7,500.

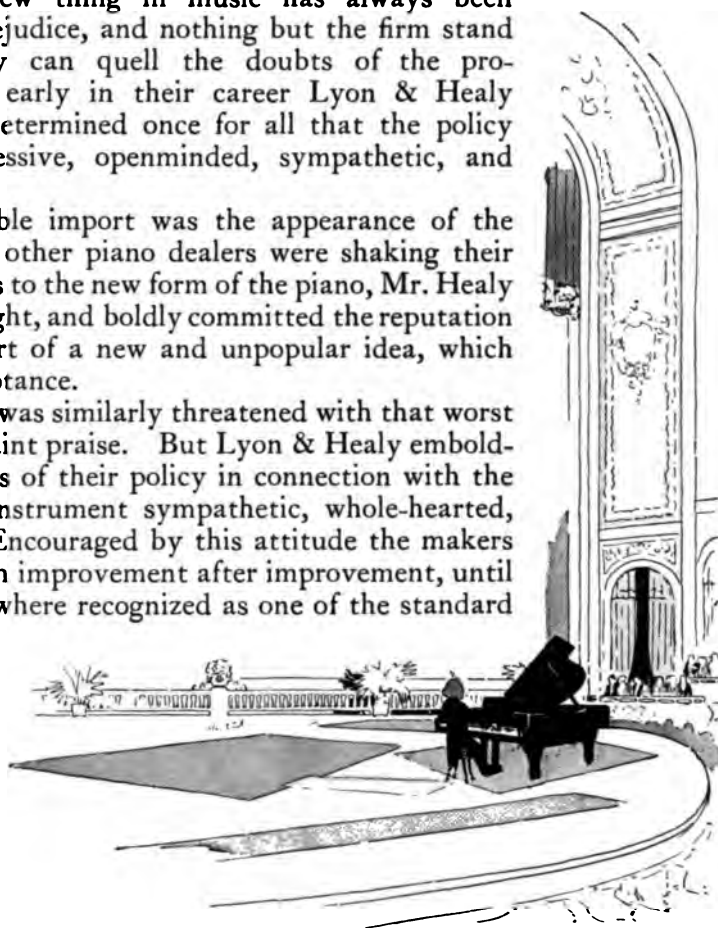
The "King Joseph Guarnerius," probably the most famous violin made by Joseph Guarnerius del Gesu, dated 1737, originally formed a part of the Hawley Collection. It was purchased by us in 1900 and afterwards was sold to the late H. O. Havemeyer for \$12,000.

By no means least among the significant services which Lyon & Healy have rendered to the cause of music has been the policy of welcoming innovations. Every new thing in music has always been confronted by tradition and prejudice, and nothing but the firm stand of an acknowledged authority can quell the doubts of the profession and the trade. Very early in their career Lyon & Healy observed this fact, and it was determined once for all that the policy of the house should be progressive, openminded, sympathetic, and courageous.

The first instance of notable import was the appearance of the upright piano, in 1870. While other piano dealers were shaking their heads and voicing their doubts as to the new form of the piano, Mr. Healy saw the logical value of the upright, and boldly committed the reputation of Lyon & Healy to the support of a new and unpopular idea, which has since gained universal acceptance.

At a later date the Pianola was similarly threatened with that worst of all fates, to be damned with faint praise. But Lyon & Healy emboldened by the unparalleled success of their policy in connection with the upright piano, gave the new instrument sympathetic, whole-hearted, and enthusiastic recognition. Encouraged by this attitude the makers of the Pianola went forward with improvement after improvement, until today the player-piano is everywhere recognized as one of the standard forms of the piano.

*Welcoming
Innovations*





General Musical Instruments
Fifth Floor

EVERYTHING KNOWN
IN MUSIC

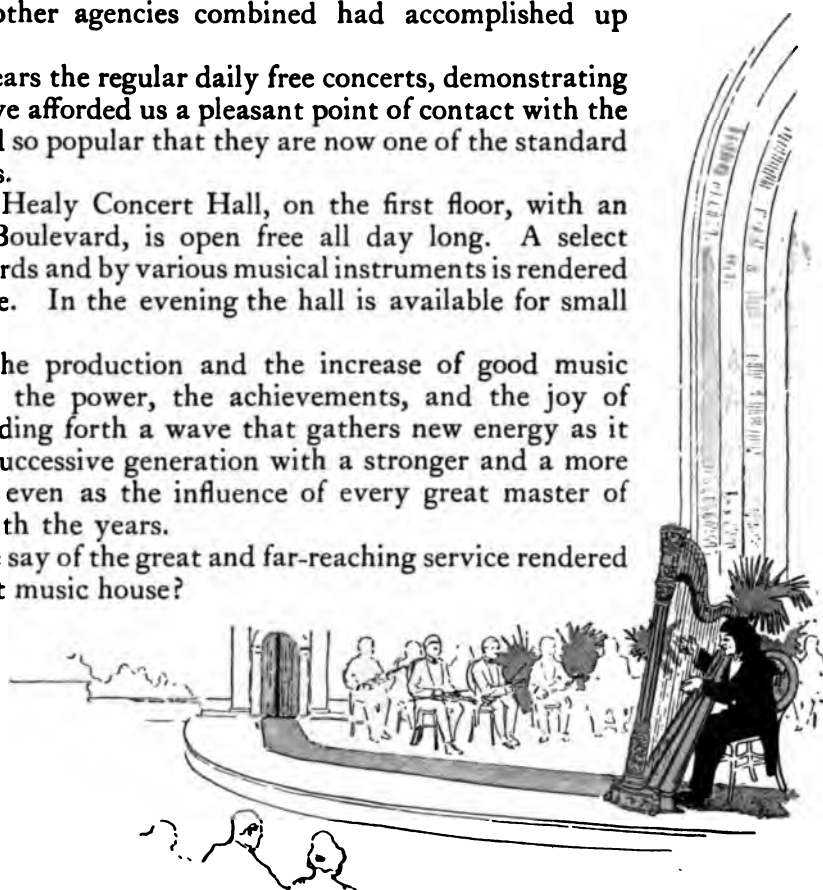
Although the phenomenal popularity of the Victrola and other sound reproducing instruments, with their all-encompassing range of vocal and instrumental music, is now a conspicuous and universally accepted fact throughout the world, there was a time when this matchless instrument was looked upon as a mere toy. The dignified traditions of the music trade would have frowned it out of court. It might have won its way in time on sheer merit alone, but the history of all great fundamental inventions emphasizes the unique service of an early sponsor. Some one must first give it recognition and an entrée to the inner circle. Again the far-seeing and sympathetic policy of Lyon & Healy put the pioneer stamp of approval upon the phonograph or "talking machine," and from that day to this its progress has been one prolonged triumph. The Victrola has done more to put good music into the homes of the people, in the schools, and in out of the way places, than all other agencies combined had accomplished up to that time.

For a number of years the regular daily free concerts, demonstrating chiefly the Victrola, have afforded us a pleasant point of contact with the public, and have proved so popular that they are now one of the standard features of our business.

The new Lyon & Healy Concert Hall, on the first floor, with an entrance on Jackson Boulevard, is open free all day long. A select program of Victor Records and by various musical instruments is rendered daily from ten until five. In the evening the hall is available for small musical events.

Whoever fosters the production and the increase of good music adds to the harmony, the power, the achievements, and the joy of human life. He is sending forth a wave that gathers new energy as it goes, and thrills each successive generation with a stronger and a more widely diffused power, even as the influence of every great master of music grows greater with the years.

What then shall we say of the great and far-reaching service rendered by the world's foremost music house?





General Offices
Fourth Floor

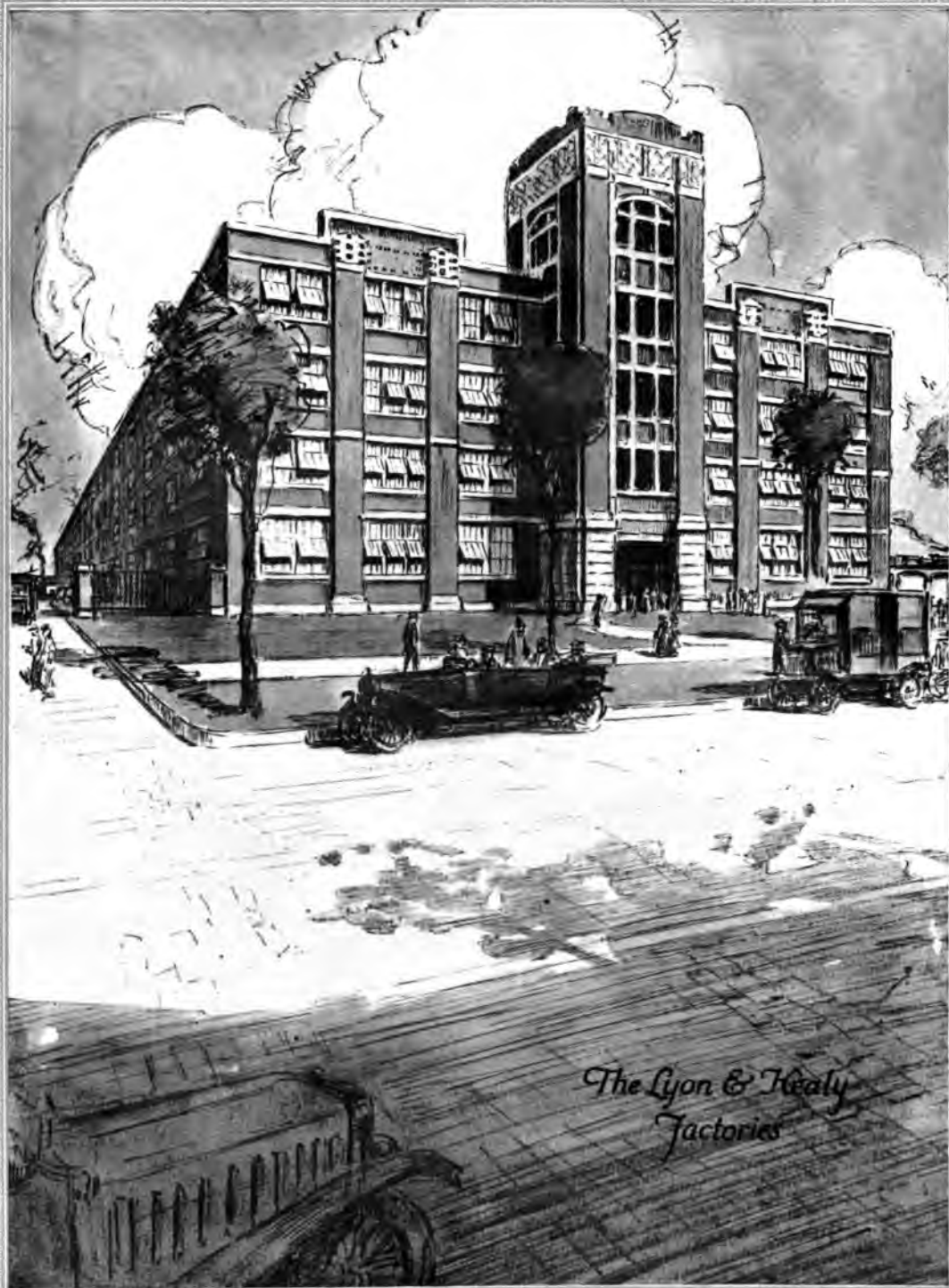
EVERYTHING KNOWN
IN MUSIC

For over fifty years it has utilized every opportunity to place the best instruments and the best music into the hands of music makers and music loving people everywhere. It has been a clearing house for the music ideas of the whole world. It has encouraged an appreciation of the best in music, and has done exceedingly much to make *the best* possible of attainment. It has stood for progress in all the means of making music. It welcomes you today, and through the years to come, to share in the opportunities it provides, and to unite in its purpose to bring music closer into human life, and by this means to release more and more of the latent possibilities of mankind for happiness, achievement, and progress.

A black and white facsimile of a handwritten signature, which appears to read 'P. J. Healy', written in a cursive script.

(Facsimile of the oldest available copy of the firm signature, written in 1872
by Patrick Joseph Healy.)





A decorative border of small, stylized flowers and leaves runs along the top and sides of the page, framing the central text.

OUR MANUFACTURING IDEALS

EVERY musical instrument, to be worthy of its opportunity, to justify the interest and skill bestowed upon it by the musician, to be a perpetual source of inspiration to the player, and to afford the fullest measure of enjoyment and intellectual profit to those who hear it, should be so made that it will yield the greatest possible tone value, that it will grow richer with right use, that it will resist the changes of atmosphere and climate, that its beauty will win for it respect and careful preservation, and that its substantial construction will insure for it a long and useful life.

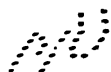
Such are the ideals which dominate our manufacturing department, and such are the instruments we produce. To this end it is our policy to employ workmen of exceptional skill, knowledge and experience; to inspire them to work for the ideal in every minute detail, and to find in their work an opportunity for the expression of their increasing skill; to provide the best materials, methods and processes that can be found; to delve deeply into the undiscovered possibilities of each element that can in any degree affect the tone value of the instrument; and to make every production a matter of pride for an organization equipped and inspired for superior achievements.

LYON & HEALY



GEORGE WASHBURN LYON

MR. LYON CAME TO CHICAGO IN 1864, AFTER CONSIDERABLE BUSINESS EXPERIENCE IN BOSTON,
AND JOINED IN FOUNDING THE FIRM OF LYON & HEALY, GIVING SPECIAL ATTENTION
TO THE PIANO DEPARTMENT. HE RETIRED FROM THE FIRM IN 1889.





PATRICK JOSEPH HEALY

MR. HEALY CAME TO CHICAGO FROM BOSTON IN 1864, AND IMMEDIATELY JOINED IN FOUNDING THE FIRM OF LYON & HEALY. HE WAS THE ACTIVE MANAGER OF THE BUSINESS FROM ITS INCEPTION UNTIL HIS DEATH IN 1905.



DURING THE FIFTY-TWO YEARS OF ITS CAREER THIS BUSINESS HAS OCCUPIED IN TURN THE SIX BUILDINGS SHOWN ON THESE TWO BRONZE TABLETS WHICH ADORN THE MAIN ENTRANCE OF OUR NEW BUILDING.

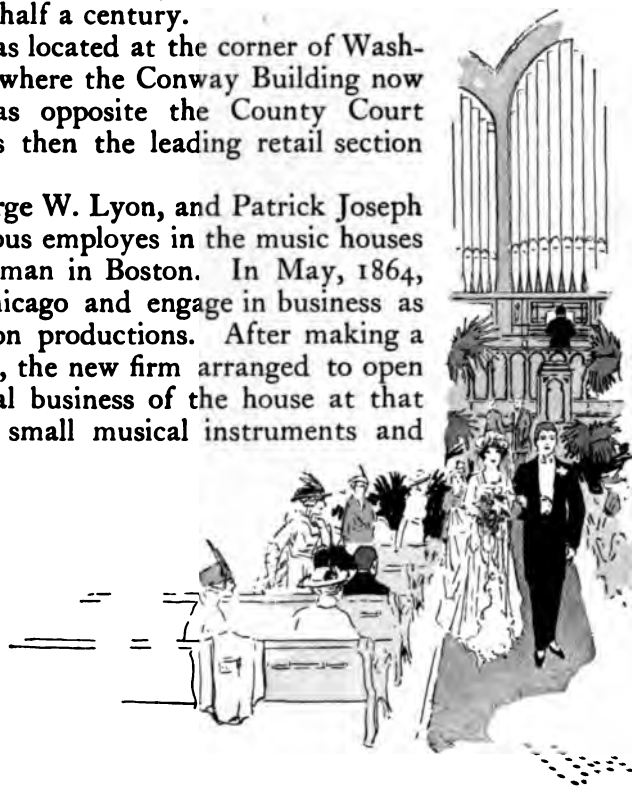


THE music house of Lyon & Healy, now entering a new epoch in its career in the occupancy of its new building in May, 1916, has grown from small beginnings to its present position of supremacy in the music business.

It was in October, 1864, during the period of the Civil War, that Lyon & Healy began business in Chicago. The firm name bears the distinction of being one of the very few in the city that has remained unchanged through the vicissitudes of half a century.

The first store of Lyon & Healy was located at the corner of Washington and Clark Streets, on the spot where the Conway Building now stands. Then, as now, the site was opposite the County Court House, and in the center of what was then the leading retail section of the city.

The founders of the business, George W. Lyon, and Patrick Joseph Healy, had been for some years previous employes in the music houses of Oliver Ditson & Co. and Henry Tolman in Boston. In May, 1864, the two men decided to move to Chicago and engage in business as Western representatives for the Ditson productions. After making a thorough investigation of the situation, the new firm arranged to open for business in the fall. The principal business of the house at that time was in sheet music and books, small musical instruments and cabinet organs.



EVERYTHING KNOWN
IN MUSIC

From the start the business grew rapidly and soon exceeded all expectations. The Boston concern sought to encourage the young men by saying: "If you have good luck, in ten years' time you will do a business of \$100,000 a year." Before the first year was up the new firm had passed that mark, and many new lines had been added.

After five successful years spent at their first location, Lyon & Healy moved to larger quarters in the new Drake Building on Wabash Avenue and Washington Street. By this time they were doing both a wholesale and retail business, and their trade grew by leaps and bounds.

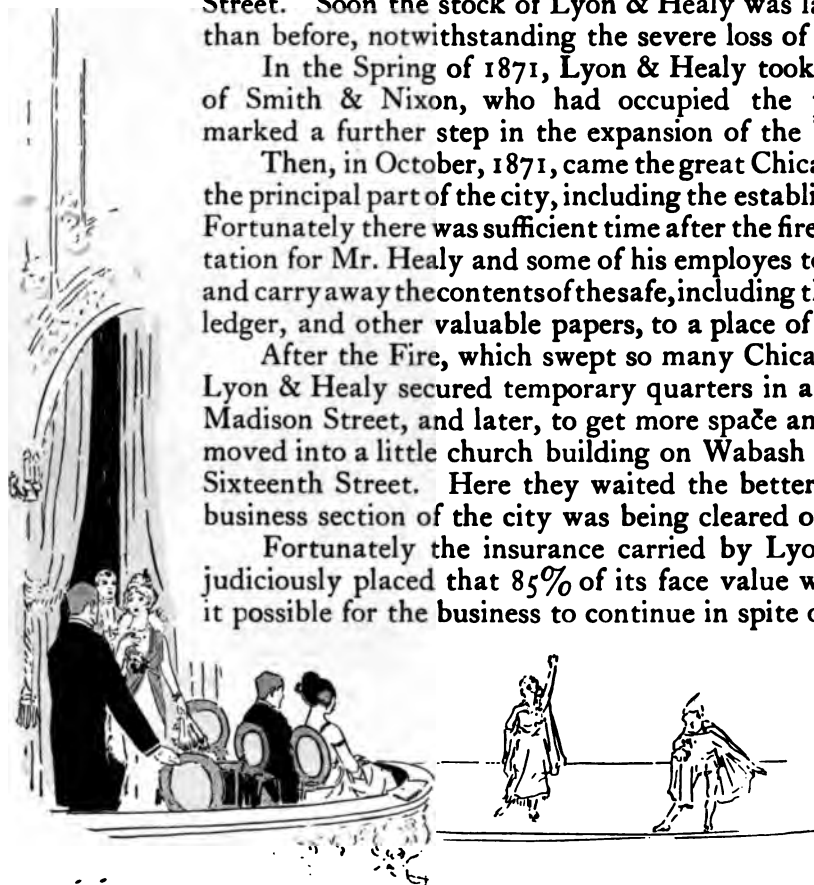
On September 4, 1870, after being in the new home but a few months, the building was entirely destroyed by fire. The great task of gathering together another representative stock of musical merchandise was promptly undertaken, and a building was leased at 150 South Clark Street. Soon the stock of Lyon & Healy was larger and more complete than before, notwithstanding the severe loss of the former store.

In the Spring of 1871, Lyon & Healy took over the piano business of Smith & Nixon, who had occupied the premises jointly, which marked a further step in the expansion of the business.

Then, in October, 1871, came the great Chicago Fire, which wiped out the principal part of the city, including the establishment of Lyon & Healy. Fortunately there was sufficient time after the fire began its work of devastation for Mr. Healy and some of his employes to get to the store at night and carry away the contents of the safe, including the money, bills receivable, ledger, and other valuable papers, to a place of safety on the West Side.

After the Fire, which swept so many Chicago firms out of business, Lyon & Healy secured temporary quarters in a small store at 287 West Madison Street, and later, to get more space and a better location, they moved into a little church building on Wabash Avenue at the corner of Sixteenth Street. Here they waited the better part of a year while the business section of the city was being cleared of debris and rebuilt.

Fortunately the insurance carried by Lyon & Healy had been so judiciously placed that 85% of its face value was realized, which made it possible for the business to continue in spite of the great disaster.



EVERYTHING KNOWN
IN MUSIC

In 1872, a store was secured at 162 South State Street, it being foreseen that this location would be in the heart of the new retail district. Again the business prospered, despite the deferred payments made necessary by the Fire, and additional space was acquired in the adjoining corner store, and various upper floors were added until finally the entire corner block at the northwest corner of State and Monroe Streets was occupied.

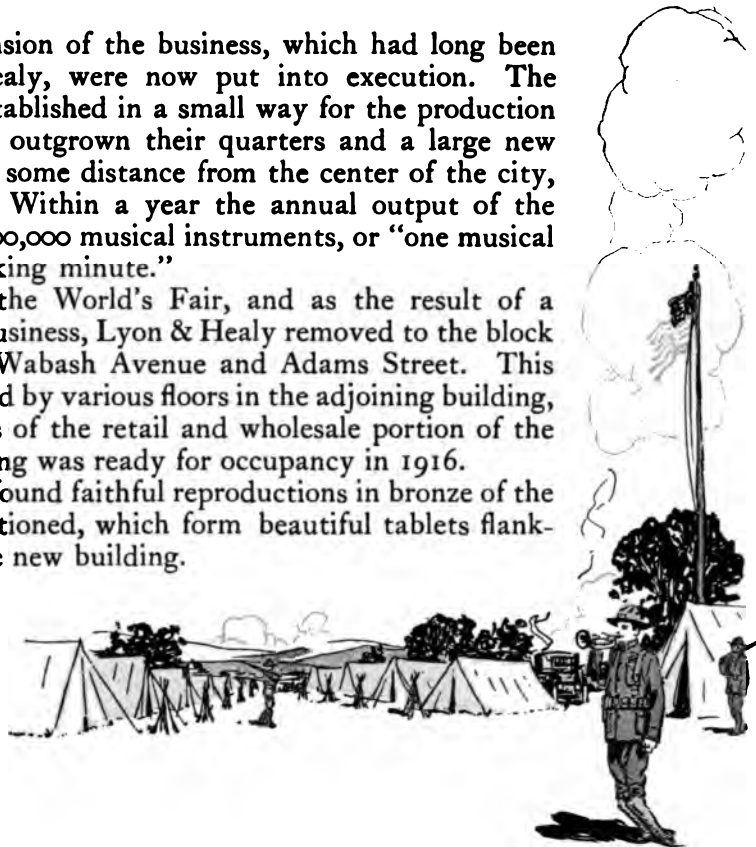
Here the business grew and prospered until that next great epoch in Chicago's history, the World's Fair, in 1893.

In October, 1889, Mr. George W. Lyon, senior partner of the firm, who was then approaching seventy years of age, retired from the business, and his interests, and the right to continue the use of his name, were acquired by the corporation of Lyon & Healy, which was formed at that time. For the next twenty-four years the affairs of the firm were directed by Mr. Patrick Joseph Healy and his official associates.

The ideas for the expansion of the business, which had long been fostered chiefly by Mr. Healy, were now put into execution. The factories, which had been established in a small way for the production of musical instruments, had outgrown their quarters and a large new factory building was erected some distance from the center of the city, opposite one of the parks. Within a year the annual output of the Lyon & Healy factory was 100,000 musical instruments, or "one musical instrument every other working minute."

Immediately following the World's Fair, and as the result of a continued expansion of the business, Lyon & Healy removed to the block at the southwest corner of Wabash Avenue and Adams Street. This building, gradually augmented by various floors in the adjoining building, continued to serve the needs of the retail and wholesale portion of the business until the new building was ready for occupancy in 1916.

On other pages will be found faithful reproductions in bronze of the various buildings above mentioned, which form beautiful tablets flanking the main entrance of the new building.



EVERYTHING KNOWN
IN MUSIC

In 1914, the factory building of 1900, by this time outgrown, was superseded by another and larger factory building, located on Fullerton Avenue at Crawford Avenue, and which is the headquarters of the manufacturing department of Lyon & Healy, its activities, however, being augmented by absorbing the entire output of other factories operated according to the specifications of Lyon & Healy.

Mr. Patrick Joseph Healy, after forty-one years of active service in the upbuilding of the business, died, April 3, 1905.

The responsibilities he laid down were taken up by the remaining members of the corporation, and the business carried forward in the same spirit of idealism and progressiveness which has ever characterized the institution. The president of the company, Mr. Robert B. Gregory, has been with the business since its beginning in 1864. The vice-president is a son of Mr. Healy. The secretary has been with the business since 1870, and the treasurer since 1883.

The present officers of Lyon & Healy are:

ROBERT B. GREGORY, President.

MARQUETTE A. HEALY, Vice-President and General Manager.

JAMES F. BOWERS, Secretary.

CHARLES R. FULLER, Treasurer.

The cumulative experience of the Lyon & Healy organization is suggested by the following roster of persons who have been connected with the business for a great many years:

OVER 50 YEARS

R. B. GREGORY

BENJAMIN DOPKER

OVER 45 YEARS

JAMES F. BOWERS

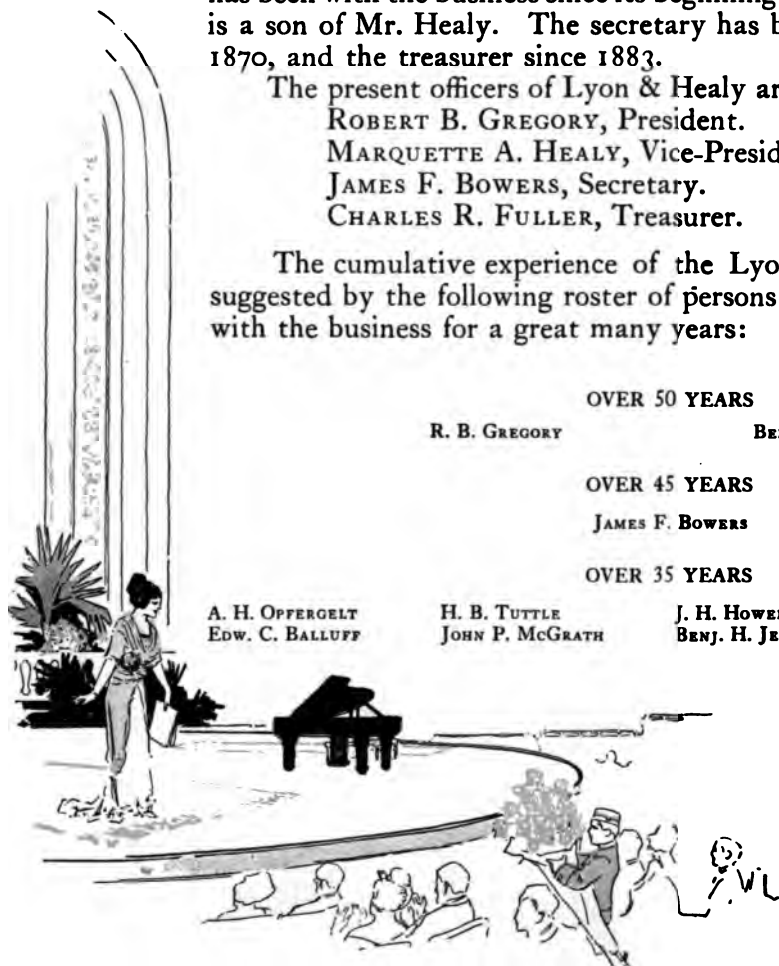
OVER 35 YEARS

A. H. OFFERGELT
EDW. C. BALLUFF

H. B. TUTTLE
JOHN P. McGRATH

J. H. HOWENSTEIN
BENJ. H. JEFFERSON

R. KRESSIO



EVERYTHING KNOWN IN MUSIC

OVER 30 YEARS

CHARLES R. FULLER
HENRY HANSES
THOMAS MACAULEY

JOHN M. HAMPE
HUGO H. HANDKE

HANS AGARDH
THOMAS F. DELANEY

THOMAS WELCH
AUGUST MICHAELIS

OVER 25 YEARS

BERNARD M. CASPERS
JAY C. FREEMAN
OMUND LARSON
EDW. F. O'BRIEN
MISS LOUISE BOCK
MISS CLARA O'BRIEN

ROBERT J. ARSCOTT
ERNEST G. CLAYSON
J. M. DVORAK
Q. E. PRIBYL
CHAS. F. IPPEL
JAMES CAREY

E. H. MCCLEVEY
M. PETERSON
JOHN E. BYRNE
WM. FILTER
M. OPLANN
MICHAEL WELDON

WM. RICHIGER
PAUL GUSHURST
NICHOLAS BAUERS
JAMES TRANTINA
PETER COYLE

OVER 20 YEARS

EDW. P. BRENNAN
JOHN DUBBS
CHARLES J. MULVEY
WM. A. STAPLETON
FRANK C. TRANTINA

FRANK ODENBACH
A. J. LEHMKUHL
J. FRANK MELODY
GEORGE H. HEMLER
C. GLUMSO

B. J. McNULTY
P. C. VITU
AUGUST FISCHER
CHARLES HINDRINGER
C. F. FABER

HARRY TUNICA
MISS PAULINE FLAHERTY
ARTHUR H. DAVIS
EDW. G. BECHT
W. I. KIRK

OVER 15 YEARS

HARRY J. FIDDELKE
WM. H. RIDGWAY
JAS. A. MACDONALD
EDWARD O'BRIEN
E. T. ROOT
FRANK METER
WM. J. DONAHUE

LESLIE C. WISWELL
JOEL B. RYDE
PAUL F. CLAUSSEN
EDW. FITZMAURICE
FRED C. BROWERS
WM. BUNNING
FRANK C. JOHNSTON

JAMES BYRNE
CRESS JONES
MICHAEL O'BRIEN
NICHOLAS DAVIDS
WM. H. COLLINS
E. A. JOLL
JOE TOHT

AUGUST PIETSCH
E. T. NICHOL
ARNOLD LEONARD
GUSTAVE HENNING
ANTONE SMID
ENGELBERTH HOLUB

OVER 10 YEARS

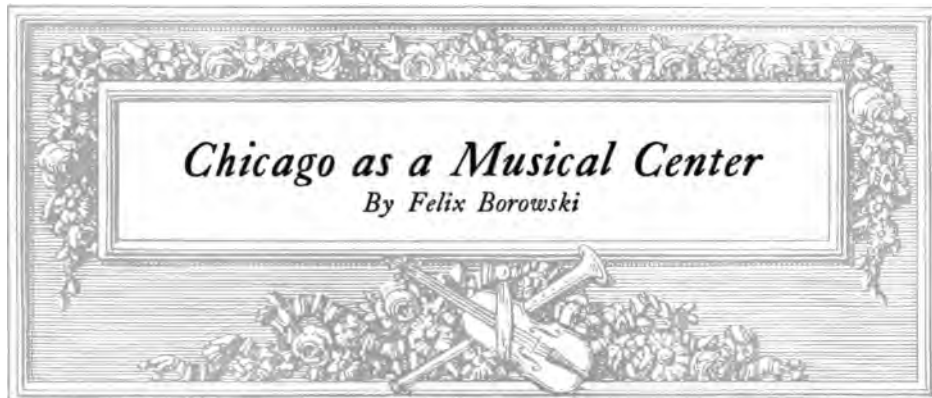
WILLIAM WALSH
LEO MILLER
JOHN WISNIEWSKI
HERBERT SCHUENEMAN
PAUL C. WAGNER
V. LAUSMANN
LOUIS GUNTHER
MISS EDNA CARROLL
MISS ELLA DAHLKE
J. P. DURKIN
JOE MAYWORM
HENRY HANSEN
H. L. JOHNSON
MISS MATHILDE WEBER

MATTHEW FITZGERALD
ERNEST HOLMES
WALTER ROACH
JOSEPH N. VASEY
ROLEY MEAUX
MISS SARAH LESSICK
JAMES HACKEL
ROBERT STANTON
CHARLES KAHL
HERMAN KROEPLIN
HOWARD WALLACE
GUSTAVE MINX
JOS. KULICEK
W. H. SCOUTEN

S. M. GILMORE
RICHARD HINE
W. N. GRAVES
W. S. BALLOU
GEO. W. CRONENWETT
STEVEN A. CLAUSS
TONY SUTULA
FRANK T. RANDALL
JOHN E. MOONEY
JACOB FEIFEL
EDW. J. RUSH
GUSTAVE LUEBS
EDW. SALLMAN
ADOLPH SAUSELLE

MISS MOLLIE MANEY
CHRISTIAN MADSEN
MARQUETTE A. HEALY
ALPHONSE SCANNELL
CARL SEABLOM
GEORGE STROHM
GERALD HIRSCH
WILLIAM SAGERT
ARTHUR KRAEMER
CHARLES CHASKE
OSCAR CHAPLEAU
D. A. McDONALD
MISS T. MACRAE

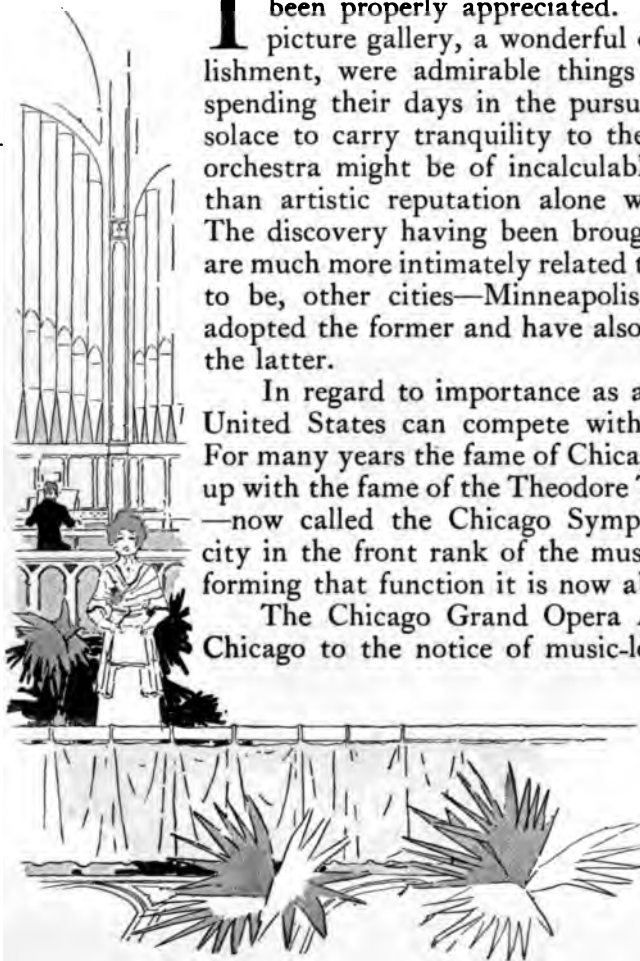




IT is only of recent years that the value of music as a civic asset has been properly appreciated. Formerly it was believed that a fine picture gallery, a wonderful orchestra, an imposing operatic establishment, were admirable things to bring relaxation to people, who, spending their days in the pursuit of commerce, needed some artistic solace to carry tranquility to their tired souls. That the fame of an orchestra might be of incalculable benefit to a city in other respects than artistic reputation alone was first made manifest by Chicago. The discovery having been brought about that art and advertisement are much more intimately related than previously they had been believed to be, other cities—Minneapolis, for instance—have enthusiastically adopted the former and have also reaped the commercial advantages of the latter.

In regard to importance as a musical center, only one city in the United States can compete with Chicago. That city is New York. For many years the fame of Chicago as an artistic metropolis was bound up with the fame of the Theodore Thomas Orchestra. That organization—now called the Chicago Symphony Orchestra—is still keeping the city in the front rank of the musical centers of the world; but in performing that function it is now ably supported by other organizations.

The Chicago Grand Opera Association has done much to bring Chicago to the notice of music-loving people everywhere. The great



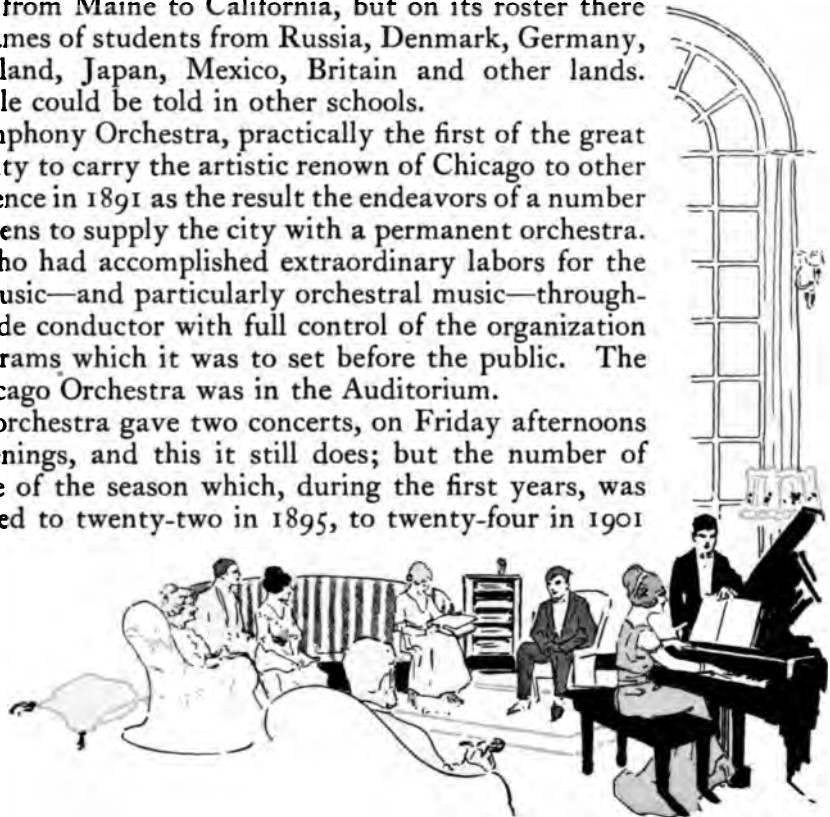
EVERYTHING KNOWN
IN MUSIC

schools, the imposing number of choral organizations, the musical clubs, the societies—such as the Civic Music Association and the Chicago Band Association—which aim to bring good music close to the people, have aroused much favorable comment throughout the country.

It is one of the outward symbols of the fame of Chicago as a musical center that it has attracted, and still attracts, students from European countries and from other continents, who come in order to take advantage of the rich artistic opportunities that now are to be found here. There were days when Germany, Austria, France and Italy drew thousands of students from America—days in which it was believed that only abroad could musical atmosphere be found. Now Americans have discovered their own country; they have discovered that it is no longer necessary nor expedient to leave their native land when in a city like Chicago there are one of the greatest orchestras in the world, one of the foremost operatic organizations, several of the largest and most complete schools to be found anywhere. At least one of these colleges has gathered its students not only from Maine to California, but on its roster there are to be found the names of students from Russia, Denmark, Germany, Sweden, Turkey, Poland, Japan, Mexico, Britain and other lands. Probably the same tale could be told in other schools.

The Chicago Symphony Orchestra, practically the first of the great organizations of the city to carry the artistic renown of Chicago to other lands, came into existence in 1891 as the result the endeavors of a number of public-spirited citizens to supply the city with a permanent orchestra. Theodore Thomas, who had accomplished extraordinary labors for the cause of the better music—and particularly orchestral music—throughout America, was made conductor with full control of the organization itself and of the programs which it was to set before the public. The first home of the Chicago Orchestra was in the Auditorium.

Every week the orchestra gave two concerts, on Friday afternoons and on Saturday evenings, and this it still does; but the number of concerts in the course of the season which, during the first years, was twenty, was augmented to twenty-two in 1895, to twenty-four in 1901



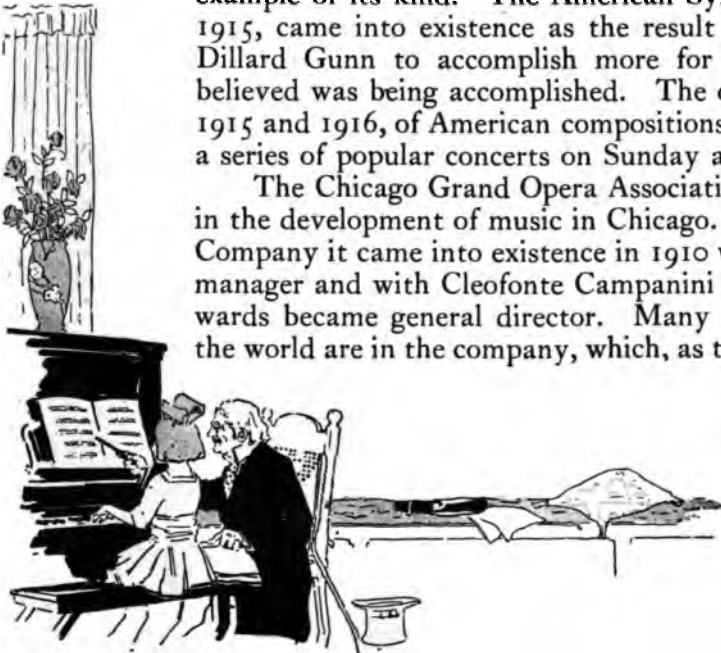
EVERYTHING KNOWN
IN MUSIC

and to twenty-eight in 1906. For years the performances were carried on at a loss, and the deficits, ranging from \$54,000 the first season to \$21,000 in later years, were met by the guarantors. Eventually it was felt that something should be done to make the Chicago Orchestra fully self-supporting and it was resolved that the first step must be to put it into a permanent home of its own. The public was appealed to and Orchestra Hall was built in 1904, and 8,500 contributors gave the fund that made this possible. Theodore Thomas did not long survive the establishment of his orchestra in its new home. In 1905 he died and his place as conductor was filled by Frederick Stock, whom Thomas had previously chosen and trained as his successor, a director of brilliant gifts who, earlier in Thomas' regime, had been for ten years one of the viola players in the orchestra.

So great has become the popularity of the Chicago Symphony Orchestra that there are no longer deficits to be met, and the performances given on Friday afternoons have for many seasons been sold out to subscribers long before the seasons themselves have begun. But the labors of the organization do not begin and end with its two weekly concerts. Every season a series of twelve popular concerts are given at low rates of admission.

The organization conducted by Mr. Stock is not, however, the sole example of its kind. The American Symphony Orchestra, founded in 1915, came into existence as the result of the efforts made by Glenn Dillard Gunn to accomplish more for the native musician than he believed was being accomplished. The orchestra gave performances in 1915 and 1916, of American compositions, and in the latter year it gave a series of popular concerts on Sunday afternoons.

The Chicago Grand Opera Association is a factor of great moment in the development of music in Chicago. As the Chicago Grand Opera Company it came into existence in 1910 with Andreas Dippel as general manager and with Cleofonte Campanini as musical director, who afterwards became general director. Many of the most famous singers in the world are in the company, which, as to the brilliancy of its ensemble,



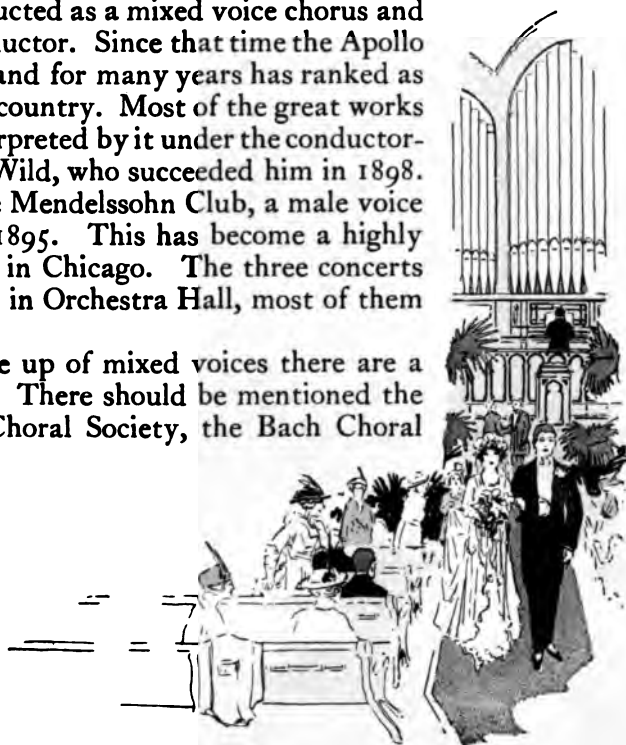
EVERYTHING KNOWN
IN MUSIC

has only the Metropolitan Opera Company of New York as its rival. The Chicago Grand Opera Association gives a season of ten weeks at the Auditorium. In former years it spread its activities over a longer period of time by presenting performances in other cities, including New York, Boston and Philadelphia, but in 1915-1916 its work was confined entirely to Chicago. Seasons of grand opera are also presented by the Boston Opera Company.

There are not many cities of the world in which choral music is cultivated so extensively as it is in Chicago. Of the choral organizations the oldest and the most celebrated is the Apollo Musical Club. Lyon & Healy, a firm which has been generous in coming forward with assistance, for artistic enterprises that are worthy of support, helped to bring the Apollo Club into existence. For it was in Lyon & Healy's music store—then temporarily at the corner of Wabash Avenue and Sixteenth Street—that the project of establishing a choral organization first was discussed. This was in the summer of 1872. The Apollo Club began as a male voice chorus and its first concert was given at Standard Hall, at Michigan Avenue and Thirteenth Street, January 21, 1873, the program consisting of part-songs with instrumental and vocal solos interspersed. In 1875 the club was reconstructed as a mixed voice chorus and William L. Tomlins was appointed conductor. Since that time the Apollo Club has become of great importance and for many years has ranked as the foremost choral organization in the country. Most of the great works for chorus and orchestra have been interpreted by it under the conductorship of Mr. Tomlins or of Harrison M. Wild, who succeeded him in 1898.

Mr. Wild also is the director of the Mendelssohn Club, a male voice chorus which gave its first concert in 1895. This has become a highly popular organization with music-lovers in Chicago. The three concerts which it presents each season are given in Orchestra Hall, most of them with a soloist of notable attainments.

Among other choral societies made up of mixed voices there are a number that offer important concerts. There should be mentioned the Chicago Madrigal Club, the Haydn Choral Society, the Bach Choral



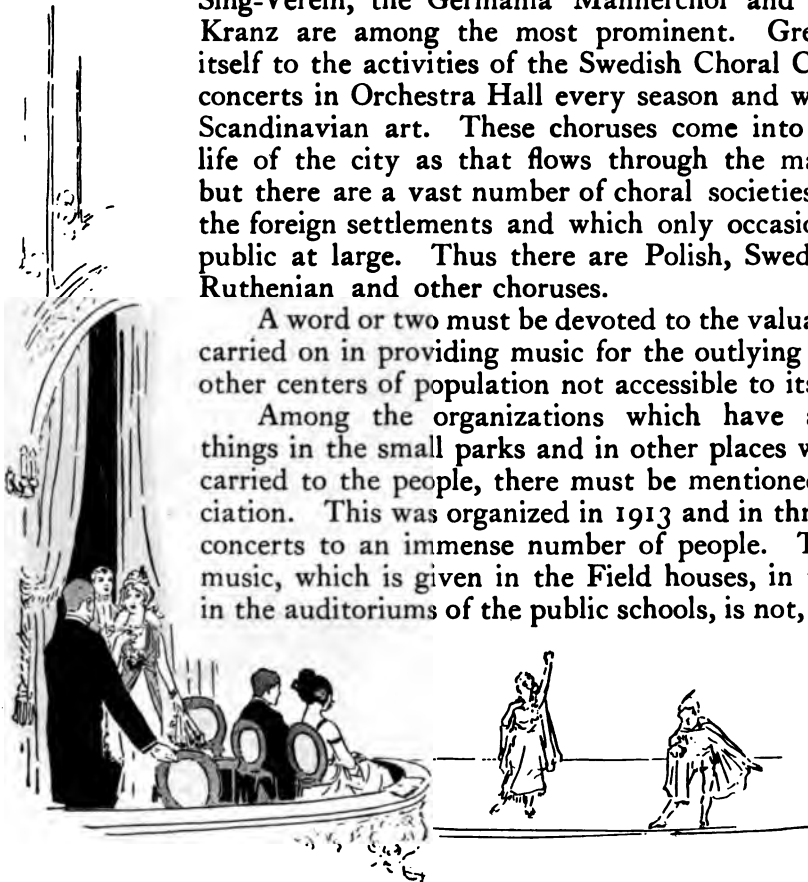
EVERYTHING KNOWN
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Society, the Marshall Field & Company Choral Society and the International Harvester Choral Society, composed entirely of their employes; the Chicago Teachers' Chorus, composed of instructors in the public schools; the American Choral Society, the Ravenswood Men's Chorus; the Evanston Musical Club and the colossal chorus which takes part in the famous North Shore Festival performances given in May in the Northwestern University gymnasium at Evanston.

In addition to these organizations, all of which present their concerts in the large halls of the city—generally Orchestra Hall—and frequently with orchestra, there are a great number of choral organizations in Chicago which are associated with foreign-born music lovers and their friends. The German singing societies are numerous and many of them offer concerts of much interest. Of these the Chicago Sing-Verein, the Germania Männerchor and the Sennfelder Liederkranz are among the most prominent. Great worth has attached itself to the activities of the Swedish Choral Club, which presents two concerts in Orchestra Hall every season and which makes a feature of Scandinavian art. These choruses come into touch with the artistic life of the city as that flows through the main currents downtown, but there are a vast number of choral societies having their homes in the foreign settlements and which only occasionally are heard by the public at large. Thus there are Polish, Swedish, Norwegian, Italian, Ruthenian and other choruses.

A word or two must be devoted to the valuable labors that are being carried on in providing music for the outlying districts of Chicago and other centers of population not accessible to its central district.

Among the organizations which have accomplished admirable things in the small parks and in other places where good music can be carried to the people, there must be mentioned the Civic Music Association. This was organized in 1913 and in three seasons has presented concerts to an immense number of people. This civic or community music, which is given in the Field houses, in the playground parks or in the auditoriums of the public schools, is not, the Association declares,



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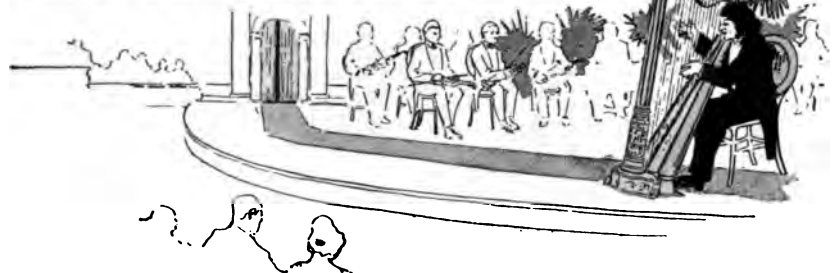
offered to the people as a charity nor as a philanthropy, but as a matter of good citizenship. Nor are the concerts of the Civic Music Association presented by any but the best singers and performers.

Another organization which has done much to foster good music is the Chicago Band Association, which states its artistic and civic mission as follows: "It was organized and is supported by public spirited men and women of Chicago for the purpose of maintaining for Chicago a splendid band, provide free concerts for the people of our city in localities where music is unquestionably a power for good, and send the Chicago Band on concert tours throughout America, all calculated to add prestige and distinction to Chicago."

The societies organized for the betterment of music and musicians in Chicago are numerous and energetic. The Society of American Musicians is doing admirable work in the exploitation of American art and the concerts which it offers at nominal prices in Fullerton Hall (Art Institute), not only afford many opportunities to local artists, but they are a valuable source of recreation and education for the public.

The violinists also have their own organization, the American Guild of Violinists. Similarly the organists and choirmasters in the city have opportunity to compare notes when they meet at the Baton Club. More extensive, perhaps, than any of the labors of the societies already mentioned are those of the women's musical clubs. Of these the two largest are the Amateur Musical Club—which in future will be known as the Musicians Club of Chicago—and the Lake View Musical Society.

The Amateur Musical Club, which officially describes itself as "an association of women, formed for the purpose of developing the musical talent of its members and stimulating musical interest in Chicago," was founded in 1875. The organization comprises more than 300 active members and about 400 associate members. Fourteen concerts are given during the season, some of these being recitals presented under the auspices of the club by artists of renown. Work of similar character is carried on by the Lake View Musical Society, a north side organization, also numerically extensive. There are other women's clubs accom-



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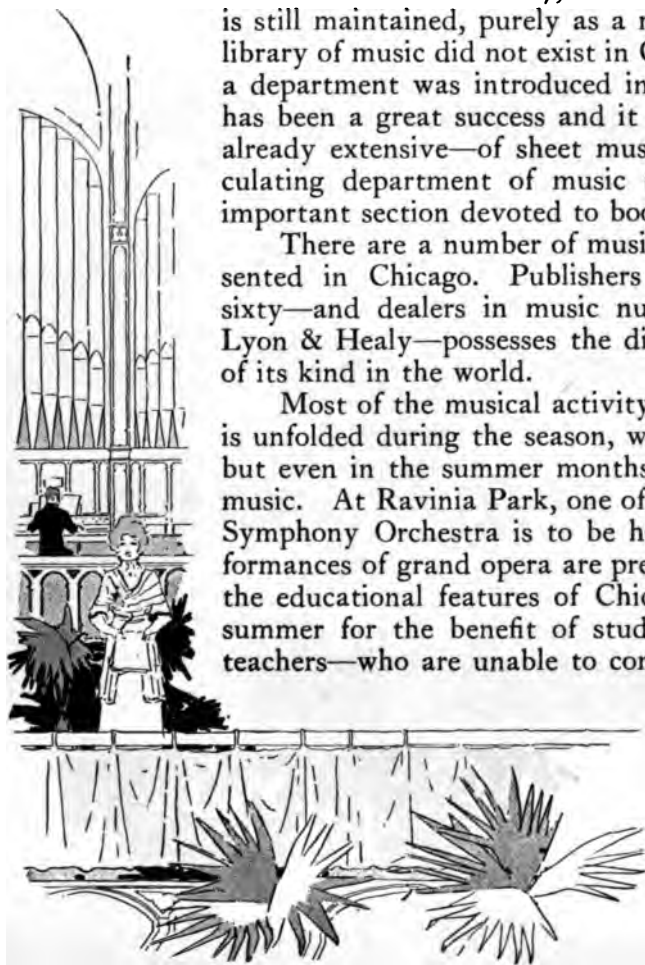
plishing effective results—the Chicago Woman's Musical Club, the Kenwood Matinee Musical Club, the Bush Temple Women's Club, and others.

The music educational resources of Chicago are larger, perhaps, than they are in any other city of the country. There are 15,000 students of music in the musical colleges and under the instruction of private teachers.

One of the important music educational features of Chicago is the public library system of providing the people with access to the best musical literature. The Newberry Library has attained national fame for its musical collection. The works on music and the scores of instrumental and vocal compositions are numerous and of exceeding interest and instructiveness, and the collection includes a large number of sacred works. Founded in 1887, the Newberry Library was established, and is still maintained, purely as a reference library. A public circulating library of music did not exist in Chicago until two years ago, when such a department was introduced into the Chicago Public Library. This has been a great success and it is planned to extend the collections—already extensive—of sheet music and scores. In addition to its circulating department of music the Public Library also possesses an important section devoted to books on music.

There are a number of musical trade journals published and represented in Chicago. Publishers of music abound—there are nearly sixty—and dealers in music number more than eighty. Of these—Lyon & Healy—possesses the distinction of being the largest business of its kind in the world.

Most of the musical activity that has been reviewed in this sketch is unfolded during the season, which extends from October until May, but even in the summer months Chicago is abundantly supplied with music. At Ravinia Park, one of the North Shore suburbs, the Chicago Symphony Orchestra is to be heard there in daily concerts, and performances of grand opera are presented by high class artists. Similarly the educational features of Chicago are largely continued through the summer for the benefit of students—many of whom are themselves teachers—who are unable to come to the city during the season.



THE INSTRUMENTS OF THE ORCHESTRA

BY
FELIX BOROWSKI

MUSIC finds its most complete and satisfying expression in the modern orchestra. Embracing many instruments the orchestra as a whole becomes the supreme instrument. Its range is practically that of the human ear—from the gentle whisper of a zephyr to the fury of a thunder-storm. Every emotion of the human heart, from the holy thrill of seraphic joy to the anguish of a soul in despair, finds a faithful delineation in the tones of the orchestra.

The enjoyment of music is immeasurably enhanced by intelligent glimpses of the composer's soul message as caught through an understanding of the language of the instruments.

The history, function and subtleties of each instrument of the orchestra would require volumes. The aim in these pages is to give a brief comment on each instrument within the range of the interest of the general reader.



THE INSTRUMENTS OF THE ORCHESTRA



THE VIOLIN

A LINEAL descendant of the old viol, the violin first came into use in the 16th century, but it did not succeed in putting its parent out of existence until the 17th century had grown old. That the viols were effectually silenced by that time may be gathered from the following verse, which dates from 1670:



The instrument is made of some seventy pieces of wood, of which sixty are built permanently into the structure; the remainder—the bridge, tail piece, etc.—are movable fittings. The four strings of the violin, tuned in fifths, are made of catgut. While the sounds which sometimes are drawn from them by inexpert performers are indeed suggestive of the noises which are wafted into the night by Grimalkin, vocally enthusiastic, the catgut in violin strings has nothing to do with cats, but is a material made from the intestines of the sheep. The violin bow in its present form dates from the end of the 18th century. It consists of a stick of Pernambuco wood, to which are fastened from 100 to 150 hairs taken from the tails of white horses.

*In former days we had the viol in
Ere the true instrument had come about,
But now we say, since this all ears doth win,
The violin hath put the viol out.*

THE INSTRUMENTS OF THE ORCHESTRA




THE VIOLA

THE viola is an older instrument than the violin, and at the end of the 16th century it possessed even the name—"violino" or "violon"—by which the violin is known today. It was in the 17th century that the latter instrument not only outstripped the viola in popularity, but deprived it of its original name. The viola is one-seventh in size larger than the violin, but some of the earliest instruments—those made by Gaspar da Salo in the 16th century, for instance—were much bigger. The instruments employed by players in the days of Bach and Handel were not only considerably smaller than da Salo's were, but even smaller than the violas which are in use today. The viola possesses four strings, tuned, like those of the violin, in fifths; but their pitch is a fifth lower than those of the latter instrument. Its lowest string is  which, in order to make its pitch clear to the lay reader, is given here in the bass clef; but viola players read their music in the alto clef: . A number of fine old violas are owned in Chicago.

THE INSTRUMENTS OF
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THE VIOLONCELLO

THE violoncello is a direct descendant of that member of the viol family, the bass viol or viola da gamba, which in the 16th and 17th centuries was the most popular stringed instrument played with a bow. Like the violoncello, the bass viol was held between the knees, but it differed from the modern instrument in having more than four strings, a much shorter fingerboard with frets, and a flat and not a rounded back. The bass viol gave the violoncello a hard struggle for supremacy, but by the end of the 17th century the latter's victory was assured, and gradually the older instrument was superseded. The violoncello possesses four strings, tuned thus: . Up to the end of the 18th century its use in orchestras was merely to furnish the bass in company with the double-basses. It was Beethoven who first gave larger freedom to the instrument, and that freedom and the upward range of the violoncello have been greatly extended by modern writers. Its voice is one of the most admired of all the orchestral instruments.

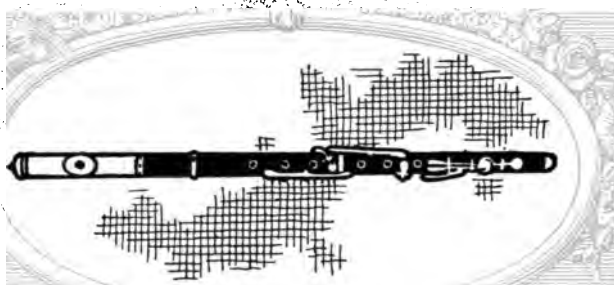
THE INSTRUMENTS OF THE ORCHESTRA



THE DOUBLE BASS

THE largest of stringed instruments, the double bass—it is not, as many people call it, a bass viol—came into general use with the appearance of the violin. Two species of double bass have been employed by performers—one with three strings, the other with four. The former has almost entirely been superseded by the latter, which is tuned thus: . It should be remarked here that for convenience in reading, music for the instrument is written an octave higher than the sounds to be produced. As the strings are much thicker than those of other stringed instruments, and their pitch is so much lower—involving, of course, slower vibration—the double bass does not usually lend itself to brilliant performance. Nevertheless, brilliant music has been written for it, as for instance, the concertos of Dragonetti and Bottesini. Up to the time of Beethoven, the double bass in the orchestra had been given parts of the utmost simplicity, partly because the technique of the players was poor, and partly because no composer had studied the individuality of the instrument.

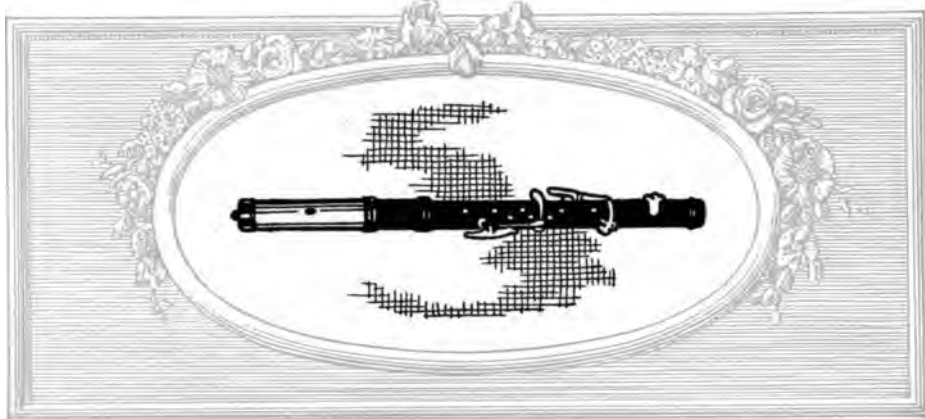
THE INSTRUMENTS OF THE ORCHESTRA



THE FLUTE


ONE of the most ancient instruments, the flute that is known to modern performers and concert-goers differs in many respects from that which was familiar to our ancestors. In the days of Bach and Handel two varieties of flute were in use—the flute-à-bec, which was held vertically and played with a mouthpiece, and the flauto traverso (once known in England and in America of Colonial times as the German flute). The latter instrument, held transversely and blown through a hole in the side, eventually superseded its vertical relative, but it was imperfect as to its scale and faulty as to intonation. Even the flutes for which Beethoven and his contemporaries wrote were a trial to the ear. “What is worse than a flute?” someone asked Cherubini. “Two flutes,” promptly said that master. It was reserved for Theobald Boehm (1794-1881) to revolutionize the instrument by placing the note-holes at acoustically correct positions on the tube, and by inventing an elaborate key system to assist the fingers to cover them. The flute now has a compass from middle C to the C three octaves above, with all the chromatic intervals between, and with facility of execution undreamed of by the classical composers of orchestral art. Melancholy lovers are supposed to find consolation in a flute.

THE INSTRUMENTS OF
THE ORCHESTRA

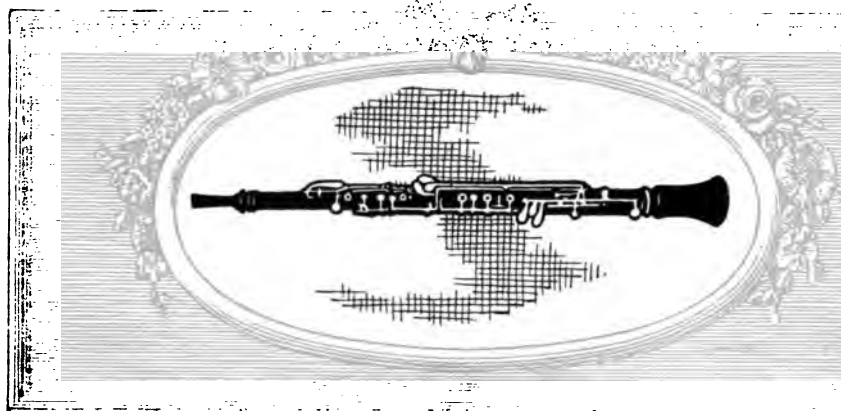


THE PICCOLO

THE piccolo is in reality a small flute, and indeed, it is given that name by the French, who call it "Petite Flûte," and by the Germans, who style it "Kleine Flöte." The Italians employ either "Flauto Piccolo" or "Ottavino"—the latter name signifying that the instrument is an octave higher in pitch than the flute. The piccolo is less than half the length of the ordinary flute, but its key-system closely resembles that of the latter instrument. Owing to the high pitch of the piccolo, composers write for it an octave lower than the actual sounds which they wish to be produced, and thereby avoid the continual use of ledger lines that would be confusing to the eye. The range extends


from , sounding, of course, an octave higher; but the top note can be produced only in a *fff*, and the working compass of the instrument does not extend beyond the B flat. The lowest notes of the piccolo are weak and seldom are used for solo passages. In the orchestra one piccolo generally is used but some scores call exceptionally for two piccolos, and Berlioz, in his "Faust," even made use of three.

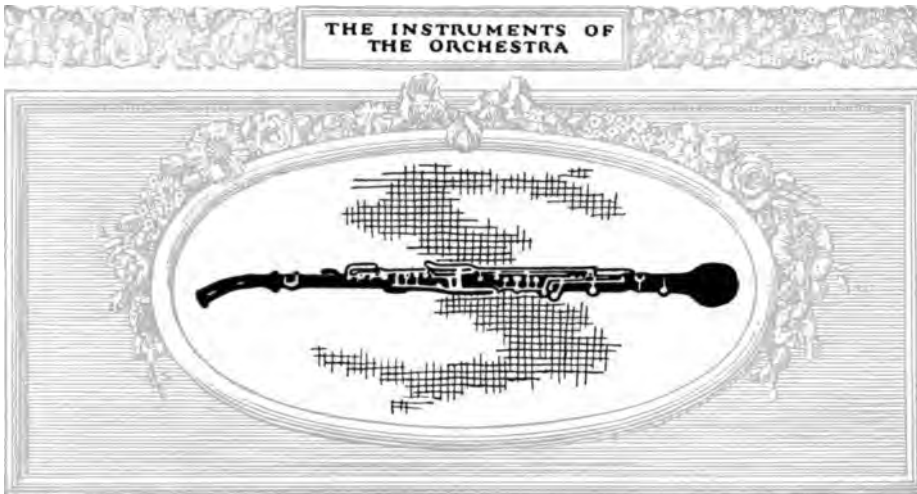
THE INSTRUMENTS OF THE ORCHESTRA



THE OBOE

THE oboe is a direct descendant of an old instrument which was known as shawm in England and schalmey in Germany. The word "oboe" is derived from the Italianized form of the French "hautbois;" *i. e.*, a high woodwind instrument, as distinguished from "basson" (bassoon), a low one. As an orchestral instrument the oboe came regularly into use about 200 years ago, the instrument at that time having been much coarser in tone, and, owing to the fact that it possessed only two keys, much more limited as to its technical possibilities than it is now. The oboe belongs to a group of wind instruments played with a double reed—two fine pieces of prepared cane placed one against the other and bound by means of silk to the end of a short piece of metal tubing, called a "staple." The body of the instrument is made of cocus, ebonite or rosewood, and upon it there is fixed an elaborate system of keys whose fingering has resemblances to that of the flute.

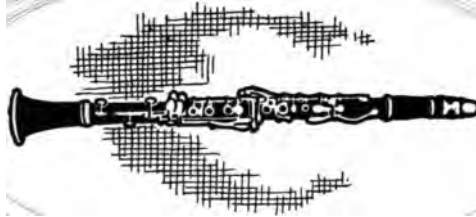
The compass is , occasionally higher, but the extremely high notes are difficult to play and poor in quality.





THE ENGLISH HORN

IT will be well to begin a description of this instrument by explaining that it is not "English" and that it is not a "horn." Otherwise its name is quite appropriate. A member of the oboe family—an alto oboe, in fact—the earliest history of the English horn had much more to do with France than with England. While the first appearance of the instrument seems to have been at the Imperial Theatre in Vienna, where it was used as early as 1762, it was French composers who made the English horn a regular constituent of the orchestra. It is curious that the dreamy, pathetic tone of the instrument should have appealed so little to the great German masters; for Haydn used it only in two works, and Mozart only in four. Beethoven, Schubert, Weber and Mendelssohn never employed it at all, and Schumann merely once. The English horn differs from the oboe in having a tube that is wider and longer, and a "bell" that is globular in form. The system of keys and their fingering is practically the same as in the oboe, but the pitch of the instrument is a fifth lower. Like the oboe it is exceedingly difficult to master and good performers are far from common.

THE INSTRUMENTS OF THE ORCHESTRA



THE CLARINET

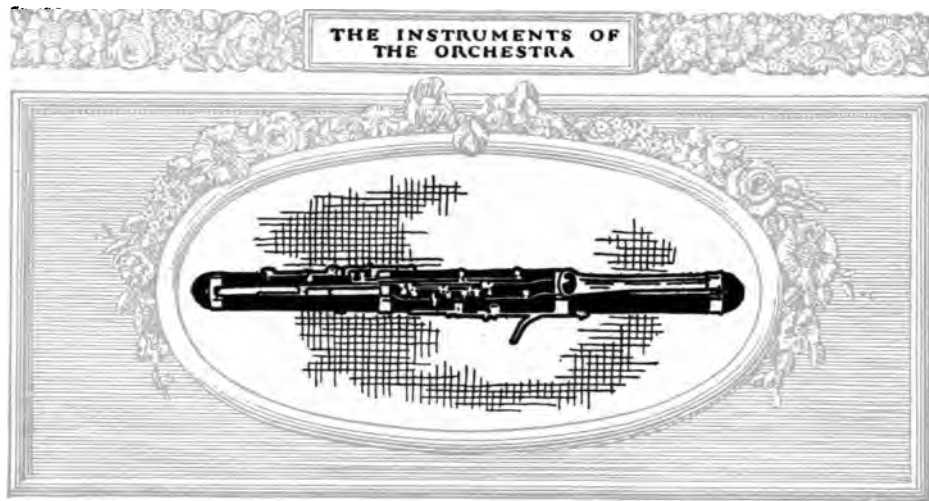
THE clarinet is generally believed to have been invented in 1690 by Johann Christopher Denner, of Nuremburg, but it would be more correct to say that Denner modified another instrument, the chalumeau, which was common in the 17th century, and which was used by Gluck in the scoring of his earlier operas. Great improvements were made in the clarinet at the beginning of the 19th century, but a much wider field was opened up in 1843 by the application to the instrument of the system of keys, etc., which Boehm had invented for the flute. The clarinet was unused in the orchestra before the production of Rameau's "Acante et Céphise," in 1751, and it was not until the period of Mozart and Beethoven that its employment became general. The clarinet is played with a single reed—a broad strip of cane attached by a clamp to a conical mouthpiece, flattened on one side to form a table for the reed. The latter is pressed against the lower lip of the performer and set in vibration by his breath. There are clarinets of various keys, but two generally are employed—clarinets in B flat and A, their compass extending from  to .

THE INSTRUMENTS OF
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THE BASSOON

THE bassoon is an important member of that family of wind instruments played with a double reed, of which the oboe is also a familiar representative. Descended from the mediaeval schalmeys and pommers, the bassoon first made its appearance in the orchestra in 1659, and it has been a regular constituent of it since the time of Handel. Owing to its supposed resemblance to a bundle of sticks or faggots, the instrument was called by the Italians "fagotto" (German, "fagott"), and it still goes by that name. The total length of the bassoon is about eight feet, but being doubled back upon itself, the length is reduced to about four feet—the whole consisting of five separate pieces. The compass of the instrument is extensive, the lowest note being E_2 ; the highest F_5 . Much has been written about the bassoon's qualities of musical humor, but it is also capable of expressive feeling, especially in the upper register. Two bassoons is the normal number in the orchestra, but three are not infrequently used in modern music. Its voice is easily recognizable by anyone.



THE DOUBLE BASSOON

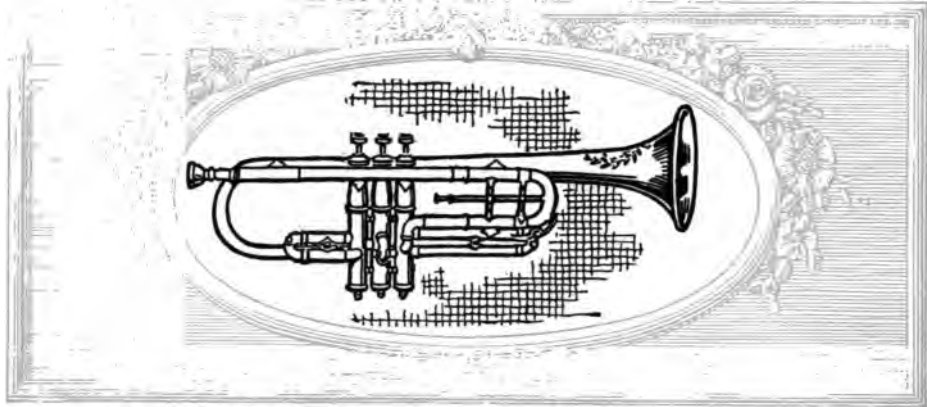
THIS instrument, called “contrafagotto” in Italian, “contrafagott” in German and “contre-basson” in French, stands in the same relation to the bassoon that the double-bass does to the violoncello. The instrument used in French, German and English orchestras is not, however, uniform in outward appearance, in range nor in quality of tone. Of the three varieties, the German double-bassoon is the most desirable, for its tone is of finer quality, its compass greater and its lowest notes more distinct than is the case with the French and English instruments. The modern German double-bassoon owes much of its excellence to Heckel, the instrument maker of Biberich, who invented the heckelphone. It is a conical wooden pipe, as to its form, and the metal bell at the upper end points downwards. The double-bassoon, like the double bass, has its music written for it an octave higher than the sounds which it is required to play—this in order to avoid the confusion which would result in the use of many ledger-lines, for the instrument descends into the bass as far as . Its tone imparts a characteristic richness.



THE CORNET

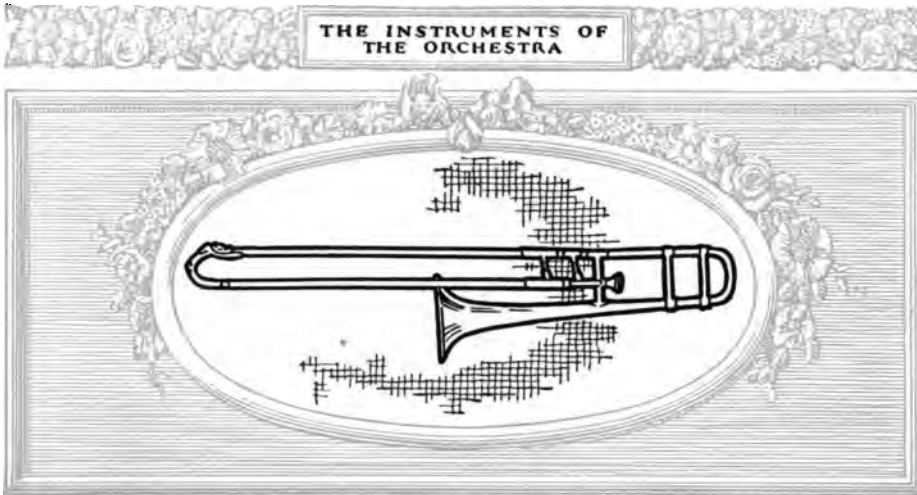
HERE we have an instrument which formerly was regarded as being better suited to theater orchestras and bands than to symphonic organizations. Writers upon the technique of instrumentation have been almost unanimous in the ferocity with which they have fallen upon the cornet—its full name is “cornet-à-pistons”—and disposed of its pretensions to representation in symphonies, overtures and other symphonic compositions, by calling its tone “vulgar,” “noisy,” “blatant” and “coarse.” Thanks to the example of French composers—Bizet, Gounod, Auber, Charpentier and others—who have regarded the cornet as a legitimate and even as an important member of the orchestra, the instrument of late years has been more and more used by writers of symphonic music. The cornet is a descendant of the post horn, which was used in earlier days on stage coaches carrying mails, and it is provided, like the trumpet, with three valves or pistons. Similarly to the horn and the trumpet, the cornet is put into different keys by the insertion of small pieces of extra tubing called “crooks.” Two cornets generally are employed in orchestra scores, in B flat and A, respectively.

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THE TRUMPET

WHAT Colley Cibber in his "Richard III" called "the shrill trumpet," was an instrument of hoary antiquity long before that author set down his drama in the eighteenth century. It is not necessary to drop a plummet into the unfathomable ocean of time in order to discover when the trumpet first was given its shape and being. As an orchestral instrument it came into use some time about the period in which Monteverde, at the beginning of the seventeenth century, wrote his operas. At the end of that century the use of the instrument was quite common, and in the eighteenth century it was used—as in the works of Bach and Handel—for bravura effects, especially in its highest register. Like the horn, the earliest trumpet was put into this key or that by inserting small pieces of brass tubing, called "crooks"—these devices altering the length and therefore the pitch of the instrument. In the first quarter of the 19th century a system of valves was invented, and these permitted the player to put the instrument instantaneously into any key and play with facility passages that were either difficult or impossible before. It was not, however, until the middle of the century that the use of the valve trumpet became general.



THE TROMBONE

THIS instrument—the “artless trombone,” Dickens called it—is one of the most ancient members of the orchestra. The principle of producing sound from a metal instrument by blowing into it, and varying the pitch of the sounds by lengthening or shortening the column of air in the tube by means of a slide, was known even to the Romans. Under the name of sackbut, the trombone was a familiar instrument to English speaking people as early as the 14th century, and so much did the sackbut of earlier days resemble the modern trombone, that to an ordinary observer the outward appearance of the former, as it was made in the 16th century, presents but little difference to the appearance of the latter. Three centuries ago there were soprano, alto, tenor and bass sackbuts or trombones, and all these were in use in the time of Bach and Handel. The soprano instrument eventually lapsed into oblivion, and about the middle of the 19th century the alto trombone was well on its way to follow it. In all instruments the mechanism is the same; a slide moves up or down the two fixed “legs” of the trombone, seven “positions” being possible. Three trombones generally are employed in the orchestra.



THE HORN

THE horn—it is often called the French horn—was an instrument which was used to give hunting signals before it was introduced to the orchestra, at the beginning of the 18th century. The early instruments gave only an imperfect scale; they consisted merely of a metal tube coiled around itself and capable of producing, as all such tubes are, only a certain number of notes by pressure of breath and of the lips. These notes—they are technically called the “harmonic series”—were added to in 1770 by the discovery that the gaps in the scale could partially be filled up by inserting the hand in the bell of the horn, and thus altering the pitch. The performer had at his disposal an instrument whose pitch depended upon the length of its tube. In order to play in different keys he was compelled to insert extra pieces of brass tubing—they were called “crooks—and these, being of different lengths, put the horn into any key that was desired. A great revolution was made in 1820, when a system of valves was invented which not only permitted the performer to play in any key instantaneously without having to insert crooks, but which gave the horn a complete chromatic scale. Four horns generally are employed in the orchestra.

THE INSTRUMENTS OF THE ORCHESTRA



THE TUBA

THE orchestral tuba—or “bass tuba,” as it really should be called—is merely one of a family of tenor and bass brass instruments which are sometimes called by other names than that which stands at the head of this article. Thus, there is the euphonium, the bombardon, the helicon, etc. It should be mentioned, however, that instruments called “tenor tuben” and “bass tuben” by Wagner, who had them constructed for use in his “Nibelungen,” are not tubas at all, but merely modified horns. Wagner did use a true tuba in his trilogy—he entitled it “kontrabass tuba”—and it was his example which led his contemporaries and his successors to make the tuba an integral part of the modern orchestra. The name of the instrument was given to it by Wilhelm Friedrich Wieprecht, who brought the first examples of it into existence in 1835, but much of the excellence of the later tubas was owing to the improvements made in brass instrument construction by Adolphe Sax, an instrument maker of Paris, who was the inventor of the saxhorn, the saxophone and other instruments. The bass tuba sometimes possesses four pistons instead of the three possessed by the horns, trumpets, cornets, etc. The bass clef is used in writing for it.

THE INSTRUMENTS OF
THE ORCHESTRA



SIDE DRUM AND TRIANGLE

THE side drum, also known as snare drum, small drum or military drum, is constructed of a metal or wooden cylinder, over which is stretched a parchment head at each end. The peculiar tone of the side drum is largely due to the circumstance that across the lower disk a number of catgut strings, technically known as "snares," are stretched so that they lie against the parchment, and the vibrations of the strokes made upon the head are communicated to them sympathetically. Without the snares the tone would be short and dull. The sheepskin heads may be tightened or slackened by means of metal rods and screws, placed upon the cylinder. In some instruments this is accomplished by cords which are tightened or loosened by means of leather braces. The drum is played with two hardwood sticks with olive-shaped heads.

The triangle is made of steel, bent in triangular form and open at one of its corners in order to permit of free vibration throughout its length. It is struck in the lower closed corner by a short metal rod. Beethoven made use of the instrument in the finale of his ninth symphony.

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BASS DRUM AND CYMBALS

THE bass drum—*grosse caisse* in French, *gran cassa* in Italian and *grosse trommel* in German—is composed of a wooden shell, cylindrical in shape and not always uniform as to size, the parchment head being stretched over hoops, an arrangement of leather braces or tags making it possible to loosen or tighten the heads. The stick used by the player is provided with a knob which is padded with felt or with some similar material. Occasionally—as, for example, where a roll is required like that played on the kettledrum—two sticks are employed. Generally, only one drum is used in the orchestra, but there have been exceptional instances in which more than one have figured in a score. Beethoven employed three bass drums in “The Battle of Vittoria.” Usually the part for the instrument is written on a stave in the bass clef, but in many modern scores merely one line without any clef has been indicated.

The cymbals are two brass plates of circular shape, which are held by a strap placed on the outer side. The plates are not quite flat, but are made slightly concave, so that the outer edges rather than the whole surface come into contact when they are struck together.

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THE KETTLEDRUM

THE kettledrum, the most important of the instruments of percussion, is of Oriental origin, for it has existed in Arabia and in other countries of the east from time immemorial as a small half gourd covered with a dressed skin. It is certain that the instrument was known to Europeans as early as the 13th century, and in England the name "ketyl drome" was familiar to the public in the reign of Henry VIII, who, indeed, was the first importer of the large sized instruments. The kettledrum consists of a basin-shaped shell of copper, covered with a parchment head, which, when struck, produces a definite musical tone, the pitch of which can be changed at will by tightening or by loosening the skin by means of the screws with T-heads which are placed around the rim of the instrument. The kettledrum is played with two sticks whose heads are covered with felt. Although two drums generally have been found sufficient for the purposes of orchestral composition, modern music often calls for three and even more than that. The largest instrument, used for the lowest notes, can descend to the low E flat on the first ledger line below the bass staff, and the small instrument can ascend to the G, an octave and a third above it.

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THE ORCHESTRA



THE HARP

IT IS needless to dwell upon the antiquity of the harp, but it will be instructive to point out that there is no other instrument of the orchestra which has served it for so long a period of time. Moreover, there are very few instruments which have retained their characteristics unchanged through the centuries as the harp has; for the essential principles of construction and of performance are today practically what they were in ancient Egypt thirteen or more centuries before the Christian era. But although the harp now, as then, consists of a number of strings of different lengths and of different pitch, stretched from one end of the instrument to the other, played by being plucked by both hands; and although it still is diatonic and not chromatic by nature, it has undergone important changes in the details of construction during the last two centuries. Pedals which, when they were depressed, raised the pitch of each string half a tone, already had been introduced in 1720, but the double action harp, in which the pedalling mechanism raised the pitch of the strings either a half or a whole tone, was introduced in 1809. It is worthy of remark that American harps—those made by Lyon & Healy, of Chicago—are used in nearly all the great symphony orchestras of both Europe and America.



THE CELESTA

THIS instrument was invented by Victor Mustel, of Paris, in 1886. It did not come into general use until about twenty years ago. One of the first to employ it in symphonic music was Tschaikowsky, who saw it in Paris in 1891. "I have discovered a new instrument in Paris," he wrote to his publisher, "something between a piano and a glockenspiel, with a divinely beautiful tone." The cost of a celesta, the Russian master said, was 1,200 francs. The celesta was used by Widor in his ballet, "La Korrigane," by Charpentier in "Louise," by Glazounow in "Raymonda," Schönberg in his Five Pieces, Glière in "The Sirens," etc. The instrument, which has a keyboard resembling that of a piano, produces its tone by means of a number of steel bars or plates which are struck by hammers similar to those of the piano. Under each steel bar there is placed a wooden resonator, and the celesta is provided with a pedal which increases its sustaining power. The compass extends from middle C to the C three octaves higher. As a rule, the instrument is written for an octave below the real sounds, but in his suite drawn from the ballet, "Casse-Noisette," Tschaikowsky wrote the actual notes that he intended should be played.



THE GLOCKENSPIEL

AS ITS name indicates, the glockenspiel—or carillon, as the French call it—originally was constructed of a number of little bells played by a keyboard similar to that of a piano. As showing that such an instrument is far from being peculiar to modern composers, it may be stated that a glockenspiel was employed by Handel in his oratorio “Saul.” Mozart, too, wrote an important part for the instrument in his opera “Die Zauberflöte.” In the score of that work it was described as “instrumento d’acciajo”—i. e., instrument of steel—and this name would seem to establish the fact that in his day the glockenspiel already had had the bells supplanted by plates of steel with hammers to strike them. In the form of a horizontal, ladderlike arrangement of steel bars the glockenspiel is constructed today. Under each bar there usually is to be found a tubular resonator. While this form of instrument, played with little wooden hammers, is now generally used, the keyboard variety of glockenspiel has not altogether become obsolete. The compass of the glockenspiel is not invariably uniform, but it is written for as a transposing instrument—an octave, in some cases two octaves, below the real sound.

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THE GONG AND BELLS

THE gong, which is known to the French, the Germans and the Italians as "tam-tam," its Indian name, consists of a circular plate of hammered bronze (eighty parts of copper to twenty parts of tin). The best instruments are of Oriental manufacture, and generally they are made so that the edge is turned over, giving the gong the shape of a large metal tambourine. The tone of the instrument is sinister in soft passages and terrifying in loud. The sound is produced by the stroke of a stick with a stuffed head.

Bells, as they are employed in the orchestra, are not at all like the articles which hang in the steeples of churches. To explain the non-employment of such bells in the concert room, it is only necessary to state that an instrument of the kind which would sound C an octave below middle C would weigh no less than twenty-two tons. The bells which most frequently are employed for orchestral purposes are metal tubes which are hung upon a wooden frame and struck with a small mallet. These are sold in sets which consist either of eight tubes, corresponding to a degree of the major scale or of thirteen corresponding to the degrees of the chromatic scale. Occasionally, other forms of bells have been used—like the saucer-shaped bells on alarm clocks.

